

Death Valley Ranch (Scotty's Castle)  
Death Valley National Monument  
Inyo County  
California

HABS No. CA-2257

HABS  
CAL,  
14-DVNM  
1-

PHOTOGRAPHS

REDUCED COPIES OF MEASURED DRAWINGS

WRITTEN HISTORICAL AND DESCRIPTIVE DATA

ADDENDUM  
FOLLOWS...

Historic American Buildings Survey  
National Park Service  
Department of the Interior  
Washington, D.C. 20013-7127

HISTORIC AMERICAN BUILDINGS SURVEY

DEATH VALLEY RANCH  
(Scotty's Castle)

HABS No. CA-2257

HABS  
CAL,  
14-DVNM,  
1-

Location: National Park Service Route 5 (commonly known as the North Highway), 25 miles west of the junction of US Route 95 with Nevada State Route 267 (commonly known as Scotty's Junction), Death Valley National Monument, Inyo County, California.

Present Owner: National Park Service.

Present Occupants: Approximately eight employees of the National Park Service and of TW Services, the local concessionaire, live on the grounds of Death Valley Ranch. The Ranch presently accommodates about fifteen people. The majority of the Park's and concession's personnel live at Grapevine, a separate living facility located three miles to the southwest. Grapevine could accommodate approximately thirty people.

Present Use: Scotty's Castle is managed by the National Park Service as a Class VI Historical Area. The Castle and its grounds are a "touring destination point" within Death Valley National Monument. The entire Ranch complex is presently (1987) open to the public all year long. Ranger-guided tours of the Main House/Annex and interpretative displays are available. A separate curatorial staff safeguards the Castle's furnishings and archival holdings on site. The Ranch complex and surrounding areas are administered as a separate unit of Death Valley National Monument, with the Monument's central headquarters in Furnace Creek.

Significance: Death Valley Ranch was built as the vacation retreat for Chicago millionaire Albert M. Johnson. Although lavishly decorated and handsomely appointed, its extremely isolated location near Death Valley is wildly eccentric and was the primary reason it attracted the degree of notoriety it has received since construction began.

Construction began modestly in 1922 but expanded in increments over a ten-year period. Questions of land ownership and crippling financial difficulties halted construction in 1931, leaving many projects only partially completed. Evidence of plans unfulfilled are interspersed among the otherwise luxurious estate.

The buildings, furnishings, and ornament were designed in the studio of Charles Alexander MacNeilledge. The entire complex is unified by the consistent use of a Spanish Mediterranean motif, and the recurrence of certain materials: redwood, ceramic tile, stucco finishes and hand-wrought metalwork. The furnishings establish a secondary theme -- the Desert -- by incorporating images of animals and plants associated with the local terrain into their design.

TABLE OF CONTENTS

I. Historical Information . . . . .	3
II. Historical Overview . . . . .	5
The Location . . . . .	6
Construction Begins . . . . .	9
An Architect is Hired . . . . .	13
Style and Materials . . . . .	14
Stucco . . . . .	16
Wood . . . . .	17
Metalwork . . . . .	18
Tile . . . . .	18
Work Organization . . . . .	20
Employees and Camp Life . . . . .	23
Landscaping . . . . .	25
Fencing . . . . .	27
Tunnels . . . . .	29
Land Ownership Thrown into Question . . . . .	30
Johnson Suffers Serious Financial Reverses . . . . .	33
Road Building and the Growth of Tourism . . . . .	34
The Ranch in Decline . . . . .	36
The Gospel Foundation Inherits the Ranch . . . . .	36
The National Park Service Buys the Ranch . . . . .	37
III. Biographies . . . . .	38
Albert Mussey Johnson . . . . .	38
Walter Scott . . . . .	40
Bessie Johnson . . . . .	40
Charles Alexander MacNeilledge . . . . .	41
Draftsmen . . . . .	42
F. W. Kropf . . . . .	43
M. Roy Thompson . . . . .	44
IV. Suppliers . . . . .	46
V. Sources of Information . . . . .	49
VI. Project Information . . . . .	53
Endnotes . . . . .	54

PART I. HISTORICAL INFORMATION

- A. Date of Erection: 1922-1931. A. M. Johnson began purchasing property in Grapevine Canyon in 1915. In 1922 Johnson decided to build a few crude structures to make his seasonal visits to the area more comfortable for him and his wife, Bessie. By 1925 Death Valley Ranch consisted of a large main building that contained an apartment for Albert and Bessie, a garage with attached shed, chicken coop and bunk house, a cook house, stables and several surviving structures from the previous land owners.

In 1926 an architect was hired on a contract basis to redesign the Main House. The terms of the agreement were often renegotiated and continually augmented to include new projects in the years that ensued.

In May 1931 construction was halted, never to be resumed. Johnson had hoped to settle quickly some questions of land ownership and to recommence with construction. Unfortunately the surveys Johnson initially relied upon proved inaccurate, and the title to the more than 1500 acres he had fenced and improved were actually a township away from what he actually owned. Johnson personally lobbied in the halls of Congress for several years.

Ultimately a special act of Congress was passed and went into effect in 1937. The provisions of the act allowed Johnson to purchase the lands he thought already his for \$1.25 an acre. By this time, Johnson had lost most of his fortune and could not afford to resume construction anew.

- B. Architect, Builder, etc.: The architect was Charles Alexander MacNeilledge, Los Angeles, California. Draftsmen that have been identified include William V. A. Hansen, Robert DeWitt, R. W. MacDonald, and Martin de Dubovay. F. W. Kropf and M. Roy Thompson were the two superintendents of construction. Information on all of these people is included in Part III below.
- C. Original and subsequent owners: The land in Grapevine Canyon was originally patented by Jacob Steininger, a German immigrant, sometime during the 1880s, under the Desert Land Act of 1871. The Upper Ranch, the land surrounding upper Grapevine Springs, totaled approximately 300 acres. After 1907 the land was claimed by W. W. Yandel, Bev Hunter, Aldolphus West and Fred Sayre. In 1916 and 1917 Johnson gained title to the Upper Ranch from Yandel, Hunter and West and in 1927 to the Lower Ranch, only a small portion of what it is now, from Sayre and Hunter.<sup>1</sup>

The remainder of the property of the Lower Grapevine Ranch [See HABS No. CA-2286] was acquired by Johnson by fulfilling the requirements prescribed by the Desert Land Act of 1871. The Act required a minimum amount of irrigation and a certain degree of improvements to the land before it could be rightfully claimed. By 1929 Johnson's developments and improvements of the 1200 acres in question were completed and his claim to the land secured.

In 1946, three years after Bessie died, Johnson established the Gospel Foundation. It was formally organized in order to manage Johnson's estate and to undertake certain social betterment functions. Johnson had befriended Tom Liddecoat, a grocery wholesaler in Los Angeles, and organizer of the Midnight Mission. Johnson installed Tom's daughter, Mary, as president and Walter Webb, a former executive of National Life, as vice-president, of the foundation.

In 1947, Johnson inserted a provision in his will that all his land holdings would fall to the Foundation once he died. Mary Liddecoat was at Johnson's bedside during the final moments of his life. She recalls how often he would come out of his coma, only to ask what the date was. It seems Johnson was concerned that if the transfer of land came within the same calendar year the provision for its transfer was installed, it would be subject to tax. Johnson died on January 7, 1948, thereby sparing the foundation the burdensome cost of taxation.<sup>2</sup>

In 1970, the National Park Service purchased the land and all its improvements for \$850,000. The funds were awarded to the NPS as part of the Land and Water Conservation Act of 1965. This act precluded the use of any of its monies to purchase interior furnishings. The foundation donated these to the NPS.

- D. Original plans and construction: The buildings have been virtually unchanged since construction. They are well documented in original drawings and contemporary photographs in the Scotty's Castle collections. See HABS reports on individual buildings.
- E. Alterations and additions: Changes to the individual buildings are noted in the individual HABS reports. Changes to the complex include the following:

1950s: Entrance court covered with asphalt, probably to accommodate the number of visitors coming to the Castle.

1978: Lower field planted in grass to accommodate its use as a recreation and picnic area for the visitors to the Castle.

May 1981: Water supply and fire protection modified. The Western Region of the National Park Service contracted the services of Jordan/Avent & Associates, San Francisco, California, to modify the water supply and fire protection of the Castle and its grounds.<sup>3</sup> Several new hydrants and fire hose houses were added for fire protection. A valiant but unsuccessful attempt was made to imitate the stucco finishes of the major buildings on the hose houses. In addition a new reservoir was added to the existing one and a new chlorination system installed nearby.

## PART II. HISTORICAL OVERVIEW

Everybody wonders about the Castle - why it is and what it is. That's what we wonder too. Scotty says it never had any beginning and it never will have an ending. And that's about true. It certainly is far from finished and it never really started. You see, we built a garage and storeroom first, and two or three bedrooms overhead. We lived in this for a while, and it was ugly. Then we began decorating and glorifying it til it turned into a castle with an organ and a bell tower and chimes. Anyway, it makes a fine lodge when we come in off the desert, hot and dusty. It's not nearly finished and maybe never will be. We don't know. We build as fancy leads.<sup>4</sup>

So wrote Bessie Johnson, the wife of Albert Mussey Johnson, a Chicago millionaire. What had started as a business expedition to inspect some mining claims transformed into a regular seasonal vacation and ultimately into a ten-year building campaign. The subtle allures of the desert combined with the captivating companionship of the likable Walter Scott, known to the public as Death Valley Scotty, to persuade Albert to forsake the luxuries of a marble mansion on the shores of Lake Michigan.

Between 1906 and 1922 Johnson visited the area about a half dozen times. Scott always met Johnson upon his arrival and acted as his guide. The two men would camp in canvas tents and tour the barren desert wilderness of Death Valley by horseback. Albert's visits were often as long as a month. At first his interests were primarily focused on the many mining claims he had either invested in or had simply heard about.

At some point his interest in the area became much more personal. His business life and the hard Chicago winters were exhausting and he often felt a desperate need for a complete rest and change.<sup>5</sup> A stay in the desert always proved tremendously beneficial for his health and relieved many of his various ailments.

In 1915 Albert began acquiring land. Within two years he had dubbed his property the "Death Valley Ranch."<sup>6</sup> Eventually his holdings totaled over 1500 acres. They were, however, split into two separate parcels about eight miles apart, and therefore referred to as the Upper and Lower Ranches.

In 1922 Albert would begin building something of his own. This first phase of construction lasted for four years and resulted in four rudimentary structures: a large main house, garage/storeroom/workshop, a cook house and a stables. All four were wood frame structures. All but the stables, which was sheathed with corrugated sheet metal, were stuccoed. In fact, they were all very plain and rather severe, but certainly more commodious than the tents and shacks Johnson and Scott had been using as shelter until then.

In June 1926 a professional designer was contracted to remodel and lavishly appoint these early buildings utilizing a "Spanish Mediterranean" motif and to design several more. Plans for more luxurious surroundings expanded incrementally for the next six years and would eventually include a large swimming pool with fountains and arcades, chimes tower, entrance gates and formal landscaping replete with rock-lined watercourses and cactus gardens. Self-sufficiency was an important factor to the complex and can be seen in the complete water and power systems that were also included.

Due to a variety of reasons, primarily the uncertain ownership of the land and Johnson's financial reverses in the depression, in August 1931 construction was suddenly halted and -- although hopes lingered on -- was never resumed. This left incomplete several projects that had only just begun.

### The Location

The choice of such a barren and isolated location, more than any other reason, makes Death Valley Ranch unique. Obviously, the Chicago winters were bitterly cold and the soothing heat and constant sunshine of Death Valley must have proved refreshing. Several personal accounts attest to how Johnson, a man permanently crippled in a train wreck, displayed a renewed vigor most thought impossible for a man in his condition, for here he roped and rode horses and played the role of "gentleman rancher" to the hilt.

That alone does not fully explain what was, to say the least, such an eccentric decision. Most published accounts center on Johnson's friendship and attachment to Walter Scott, more commonly known as Death Valley Scotty, as the central factor in his decision to locate here. No doubt that played an important part, for it was Scott that introduced Johnson to the area. Johnson had been one of several investors in a series of phony mining propositions Scott, a huckster and charlatan by trade, was habitually concocting. In 1906 Johnson made his first trip to Death Valley in order to inspect the mines Scott had convinced him existed. The state of Nevada and the entire region was then undergoing its last great mining boom because of the silver strikes in the Goldfield and Tonopah areas, neither of which were far from Death

Valley. The two men traveled extensively together by mule and horseback investigating mines throughout the region, and it was not long after his first visit that Johnson realized the truth about Scott.

But even after Johnson realized that Scott had lied and cheated him he continued to befriend him. Perhaps Johnson envisioned Scott as one of the last of the romantic figures engendered by the Wild West, or maybe Johnson was completely enraptured with the stories and tall tales Scott was so expert at telling. Despite a rather scurrilous reputation, Johnson felt that Scott "was absolutely reliable and I don't know of any man in the world I would rather go on a camping trip with than Scott."<sup>7</sup> Although Scott's involvement in all phases of construction was minimal, he was an almost permanent resident of the Ranch and always a welcome guest of the Johnsons.

To say that the two men were opposites is an understatement. Johnson had been born into a wealthy family in Ohio. He was raised to be devoutly religious and never swore, smoked or drank liquor. After graduating from Cornell University with a degree in civil engineering he married Bessilyn Morris Penniman and went on to make his own fortune in the corporate world of finance and big business. In 1899 Johnson and his father were involved in a terrible train wreck. Johnson's father was killed instantly and Albert's back was broken. He was immobilized and bedridden for eighteen months. Eventually he recovered, but was left permanently crippled.

Scott was born and raised on a working Kentucky horse farm. At the early age of eleven, Scott ran away from home to join his two brothers, employed as ranch hands in Humboldt Wells, Nevada. After working as a water boy for a survey team and running mules for the Harmony Borax Mines in Death Valley, Scotty worked for twelve years as a rough rider in the Buffalo Bill Wild West Show. He eventually moved back to Death Valley, established a camp near Grapevine Canyon, his favorite part of the valley, and adopted it as his home. Whatever the basis for their relationship the two men continued to hike and camp together and Johnson could always count on Scott to meet him with horse and pack, ready to go.

Besides their abiding friendship, other factors played a role in Johnson's decision to build a "Castle" in a countryside that most would have considered uninhabitable. For Johnson and his wife the isolation the land afforded was an asset. Albert knew that water was the most precious of all commodities in the desert and in his own words it alone "put a place on the map."<sup>8</sup> After taking Bessie into the desert for her first time she also realized the value it had.

Water! I had never realized its importance before. You must travel the Wilderness to know its value. The Desert can never be largely populated just for the want of water. This is the reason we will never have near neighbors at the castle.<sup>9</sup>

The protection afforded from such an unpopulated land was something Johnson and his wife grew to appreciate and prize.

We had traveled along through the sage, for three hours and had seen no one. Even to [this] day we often travel, on good roads, a hundred and fifty miles and never see a soul or pass a car. This is one of the charms of the Desert, after fighting your way through city traffic.

The peace of it is such a joy after the turmoil of life outside. The mountains are fortresses of protection.<sup>10</sup>

Fully cognizant of the essential role water played, Johnson purchased an already somewhat developed and particularly well-watered parcel of land - the Steininger Ranch. The Steininger property was situated in Grapevine Canyon and included a vineyard, some fig and fruit trees, and a few wooden shacks made of railroad ties. The shacks served as shelter for Johnson and Scott for the first few years before any new construction was initiated. The Ranch's greatest asset, however, was its abundant year-round source of water. The natural spring had a flow of 300 gallons a minute and supported the lush growth of wild grapevines that gave the canyon and the spring their names. This amount of water could more than adequately provide for their personal needs and would eventually be employed to run construction machinery and electrical generators when development intensified.

In addition the location was situated at an elevation of three thousand feet. At that altitude it would escape the scorching temperatures of the desert floor and the sub-freezing temperatures of the high Nevada basin. This too gave the Johnsons a sense of protection, this time from the elements.

The Castle is three thousand feet high and is nestled away in a small protected canyon. Storms may be raging all around, but there's 'peace in the Nest' and we are warm and safe and cozy, as the country round about is gripped in the arms of a raging blizzard and the mountains blanketed in snow.<sup>11</sup>

Up until 1921 Johnson had made his month-long trips to the desert a regular spring pilgrimage. He always looked forward with great anticipation the chance to leave behind the worries and demands of high finance, but generally found it hard to get away.<sup>12</sup> The year 1921 proved one of mixed blessings financially. At the same time the National Life Insurance Company, of which Johnson was president, had its best year ever, another company of which he was also president, the North American Cold Storage, lost over \$150,000. The loss of such a sum left Johnson depressed and resulted in a loss of confidence. While he was in this frame of mind it was harder to make split-second business decisions required of a man in his position.<sup>13</sup>

In an effort to relieve his feelings, he took some time off to travel. After a one-week sojourn up north in September 1921, Johnson wrote to his sister Cliffe describing how he had felt renewed and what he hoped for the future.

The little week's trip I had away showed me how tired I was and how much I needed a change and a rest. It is a long pull and a steady strain, with responsibility and detail every day that wears you out; but things are in pretty good shape now and I am going to try to be away a little more this coming year.<sup>14</sup>

A few days later Johnson informed his sister that he was going on a month-long trip with his final stop to be in Goldfield, Nevada, sixty miles away, but still the closest town of any size to his property. "This is hardly a pleasure trip but more of a business trip, as there are a number of things I want to look over and we are going to make some changes on the ranch." The letter does not say who the "we" refers to or what kind of changes Johnson had in mind. Nonetheless, it was soon thereafter that Johnson hired a superintendent to live and work on his Ranch and to start construction of several new buildings.

#### Construction Begins

In the fall of 1922, after about a year of planning his "changes on the ranch," Johnson hired Frederick William Kropf to be his construction superintendent.<sup>15</sup> He had met Kropf while visiting Deep Springs College, a nearby preparatory school established in 1917 by his close friend and associate L. L. Nunn. Johnson was a frequent visitor of the school and often stopped there en route to his own property. While there Johnson would regularly confer with Kropf about his plans for construction. Kropf was, at the time, occupied with the erection of the school's first buildings. When construction at the school was completed, Johnson hired Kropf to oversee building operations for him.

Kropf, trained as a carpenter in Utah, oversaw all facets of construction of the first three structures: first a garage, then a large two-story main house and lastly a cook house. They all had flat roofs and flat white stucco finishes. Overall they were severely rectangular. Of the three structures only the framing plans for the garage and main house, as well as a plan for the main house, still survive. None are signed, but Johnson probably designed all of them himself. Trained in school as an engineer, he openly professed his preference for right angles for they symbolized that the building "was on the square."<sup>16</sup>

The work proceeded slowly at first with only a few men employed. Within a year a crew of approximately thirty men lived and worked at the site. The majority of them were Indians native to the area and were either Shoshone or Paiute. The remainder were whites, generally skilled in a particular trade, such as carpentry, masonry or plastering, that Kropf had recruited in Los Angeles. The entire crew was divided into teams that were each assigned a different task. For instance one team would do all the lathing and plastering and another would truck and wash all the sand and gravel. The Indian crew was always assigned the tasks involving manual labor. Skilled work was almost

always performed by white workmen. There was at least one instance, however, that an Indian worked as a plasterer. There were perhaps other exceptions as well, but Kropf preferred not to hire Indians because he felt they drank too much and were unreliable.<sup>17</sup>

Kropf was also a firm believer in unions and maintained an eight-hour day and six-day week as the standard schedule.<sup>18</sup> Because of the extreme summertime temperatures, construction was generally suspended for the months of June and July.

Almost all the building materials, such as lumber and cement, were shipped by train and delivered to Bonnie Claire, a railroad siding on the Tidewater-Tonopah Railroad line, about twenty miles northeast of the construction sight. From there they were hauled over poor dirt roads by the Ranch's own trucks to the Ranch itself.

All the construction work was accomplished manually with hand tools. Scott's mules pulled a Fresno scraper for almost all of the excavation and grading work necessary for these earliest structures. In at least one instance, Kropf piped water down from the springs further up the canyon and prepared the site for the main house by hosing it flat. In order to plaster the upper part of the two-story main building, the men employed what they referred to as "outriggers." These were simply pieces of lumber secured by cleats that extended beyond the roof and were sturdy enough to hold scaffolding.<sup>19</sup>

Once the main building was finished, the Johnsons took residence in the upstairs apartment. Johnson often visited the Ranch without Bessie. Conditions were still comparatively primitive to what the Johnsons were accustomed to in Chicago and what Albert thought proper and fitting for his wife. Scott moved from his shack and occupied the room on the ground level just below the Johnsons' apartment. This freed the shack Scott used for the occupancy of other employees.

Whenever Johnson was at the Ranch he became deeply interested and involved in every aspect of construction. He constantly gave Kropf verbal instructions as to what he wanted done. This might account for why so few original drawings for much of the work of this period can not be found.

Scott's responsibilities relating to the construction were minimal. For the first year Scott cooked all the meals provided the white crew. Melba, Kropf's daughter, was hired in August 1923, when the number of employees was increasing, to replace Scott as cook. One of the rooms in the north end of the garage, the first building to be finished, was used as a kitchen. Melba lived in the storeroom next to the kitchen in the garage.<sup>20</sup>

Kropf and his son Milton put in a concrete floor and shared one of the "tie shacks" left over from the Steininger Ranch. Milton, still a young boy, helped with filling out the payroll and the monthly progress reports and sent them to Johnson's personal secretary, Miss Devlin, in Chicago.

Johnson provided all the white men with housing that usually consisted of either canvas tents or crude temporary structures. Room and board were deducted from everyone's wages. The Indians provided their own housing that consisted of either tents or wickiups. They did not pay for room and board but their wages were usually on a lower scale.

Johnson insisted that the two groups of men live separately in completely segregated camps. The Indian camp was usually farther up the canyon and beyond the limits of the property Johnson owned, where the white workmen generally resided. Johnson did not allow any alcoholic drinking and forbade the visitation of the Indian camp by any white man. If caught the perpetrator was fired. It is not known why he was so insistent upon the latter provision or which group he sought to protect.

Every day that Bessie was at the Ranch she held religious services that all the white men were required to attend. The location of it varied throughout the grounds. Although Albert was gaining a national reputation as a preacher, only Bessie would deliver the sermons at the Ranch. Kropf, raised as a Mormon, once interrupted Bessie and said, "For a change we would like to hear some concepts from some other religion. We will hear from this fellow."<sup>21</sup> It is not certain if this was the cause, but it was not long afterwards Kropf was let go. His services were terminated in July 1924. Melba had been fired because of a disagreement with Bessie three months earlier.<sup>22</sup>

In the winter of 1924 Johnson tried to find a replacement for Kropf and made efforts to locate Matt Roy Thompson.<sup>23</sup> Thompson had been a friend of the Johnsons for quite a long time. He had first met Bessie while they were both students at Stanford University. Because of the losses his family incurred in the Panic of 1893, Thompson was forced to leave school. At approximately the same time, Bessie transferred to Cornell where she met and eventually married Albert. Thompson and the Johnsons stayed in touch infrequently over the years. When the Johnsons contacted Thompson he was employed by the Interstate Commerce Commission as a land appraiser.

Thompson traveled to Chicago to discuss the project. Johnson offered him the position and then Thompson accompanied the Johnsons to Death Valley to see first hand what the project entailed. Thompson requested a one-year leave of absence from his current position. His request for leave was granted and he accepted the position as general superintendent at the Death Valley Ranch. Thompson fully expected to resume his activities with the ICC after only a single year in Death Valley. As plans and his involvement grew, so too did his commitment to the project. He stayed in Johnson's employ for the next six years.

Thompson assumed his duties at the Ranch in October 1925. The stables, chicken coop and workshop/shed were all under construction when Thompson started work. They were all probably started after Kropf had left. This means that for approximately one full year construction had continued without an on-site supervisor. By the time Thompson arrived, the stables required only a few finishing touches before it was completed. Construction of the

long shed had started, but required a lot more work, and was one of the first major projects Thompson oversaw. The chicken coop was just nearing completion when Thompson arrived on the site. By the time it was almost finished it was decided to use it for housing instead and became known as the "bunk house." A chicken coop was then located in the long shed. All three of these buildings were designed by Johnson. The stables and the shed were designed in November 1923, within a week of each other, and are similar in many respects.

By 1924 a separate Cook House was finished. This structure was devoted to preparing meals for the white crew. Besides a kitchen, it included a dining room for the men and a bedroom for the cook. Since all the preparation, cooking and eating of meals now took place exclusively in the cook house, the storeroom and cook shack in the north end of the garage were no longer necessary. They were converted and used instead as Thompson's office and private apartment.

The first project Thompson started from the beginning was a one-story building parallel and to the north of the main building. In January 1926 Thompson went to Los Angeles to recruit additional workers for this building.<sup>24</sup> It was to be made entirely of concrete and would serve various purposes. Originally known as the "Cellar" it would later take the name of one of its major rooms and be called the "Commissary" or "Commissary Building." The Commissary itself served as a storeroom for food stuffs and other general supplies. A large open-air room in the center of the structure sheltered a work area for construction machinery and later was also used as a garage for automobiles. The room to the west of that became the "Power Room" where a Pelton water wheel would drive a small electric generator.

It was close to that point that a reporter visited the Ranch. An article in the March 1926 issue of Sunset magazine described the buildings at the Ranch as follows:

Already there is a two-story building of concrete construction [the main house], with screened-in sleeping quarters, luxurious bath rooms and expansive dining quarters. There is a garage that houses three trucks and two passenger cars and has sufficient empty space to care for a fire department. There is another enormous building [stables] that shelters mules used in the development work. And Scotty is building a plant [the Commissary Building] to generate electricity by the use of power that comes from spring water flowing from higher ground.

This is only one of the many articles of the period that mentioned Scott as the main protagonist. The activity at Ranch combined with its unusual location and word of it began to travel far and wide. Ironically the Johnsons chose this location in order to escape the crowds and pressures of the city. They certainly did not mean to attract the attention of the curious public. The lavishness that they sought in their new home was not meant to impress strangers or the public-at-large, but only meant to please themselves and to

ingratiate those few individuals they invited there as guests. That being the case, it is not so hard to understand why the Johnsons allowed Scott to claim the building as his.

Scott was a character that loved to be center stage. He practically thrived on it. Neither Albert or Bessie cared for that kind of attention. In fact Albert purposefully tried to keep his name out of the newspapers and began to rely on Scott to handle all publicity.<sup>25</sup> Albert must have realized that he would need a front if he was ever to evade the public's growing scrutiny. When asked by a reporter what his relationship to Scott and the Ranch was Johnson reportedly said, "I'm only his banker."<sup>26</sup> Although Scott had practically nothing to do with any part of the construction directly, Johnson continued to allow Scott to be the figurehead for the entire operation. Friends of the Johnsons and those who actually worked there knew the truth, but most of the public was kept unaware. The sham was so convincing that even today it becomes hard to separate fact from fiction.

#### An Architect is Hired

It was not long after construction began at the Ranch that Johnson began thinking about hiring a professional architect to design something more splendid and appealing. The first architect he approached was Frank Lloyd Wright. Wright had recently established an architectural office in Hollywood and his recent commission for the Imperial Hotel in Japan had just withstood an earthquake. Wright attributed the survival of the hotel to his use of cantilever construction. The favorable publicity Wright received was tremendous and might have been the reason Johnson was drawn to see him.

Besides the Ranch, they discussed the possibility of designing a large office building on the property Johnson owned adjacent to Water-Tower Square in Chicago. Wright was paid a twenty thousand dollar retainer and together the two men traveled by car to Grapevine Canyon sometime in the winter of 1923. Afterwards Wright prepared approximately twenty drawings for what he titled the "Dwelling Of Albert Johnson." Eight of them are in the Reference Library at Scotty's Castle. The remainder are in the archives at Taliesin in Scottsdale, Arizona.

Why Johnson decided not to use them is unclear. Wright, in his autobiography, believed that Johnson was simply too conservative for something so daring and different. According to a second account, Johnson remarked, "Mr. Wright's plans were beautiful in their indigenous purity, but they were in keeping with one's idea of an adobe indian village - not a real hacienda, which we wanted - so we discarded them."<sup>27</sup>

In November of 1925 Thompson prepared a simple line drawing of his own proposal for the remodeling of the main house. The basic element of the design was to add a series of round-arched porticoes to encircle the entire house and the building behind it, probably the Commissary. A lake was to be built just in front that would feature some stone work along the shore.

Thompson later explained that he wanted to reproduce the effects of the Stanford campus, his alma mater.<sup>28</sup>

Johnson chose instead Charles Alexander MacNeilledge as the man to remodel his Death Valley Ranch. On June 4, 1926, the two men entered into a contract, the stipulations of which required that MacNeilledge be paid a \$1,000 flat fee in return for the

. . . designing and preparation of sketches and detailed working drawing [sic], sufficiently detailed to enable my carpenters and other workmen on the job to erect buildings according to your sketches, and also including the purchasing and bills of material for the Redwood lumber, hardware, electric light fixtures, etc. required for my main house or residence with attached porches and pergolas, etc., located in Grapevine Canyon, Death Valley, Inyo County, California.<sup>29</sup>

The above quote seems to indicate that some of the basic design elements that make the Ranch unique were already decided upon at this point; particularly the use of specific materials and the emphasis on metal hardware and custom-made lighting fixtures.

### Style and Materials

The style chosen for the Death Valley Ranch complex can be called a number of different things. Some have called it Spanish Colonial Revival; others Spanish Mediterranean. Other have said the Ranch was modeled after a Spanish Villa or Hacienda, while others still have preferred to cite its Spanish-Moorish influences. Bessie Johnson liked to call it "Spanish Provincial." Albert Johnson followed the lead established by the architect himself, who simply termed it, "The Spanish Style."

Unfortunately the Ranch evades simple definition. However, one thing is clear. The design of the house and subsidiary buildings had for the most part a Spanish origin. The Spanish influence was being felt all over the country. Johnson had one occasion when he was greatly impressed by it near his home in Chicago.

I have been talking to Mr. MacArthur, who is our City Manager for Chicago, and who is building a house out west of Lake Forest in the Spanish Style.

He is using hollow tile walls with wooden trusses similar to the ones we are using. He bought his old timbers, picking them up around Chicago worm-eaten and full of nail holes, had them hewn and is putting them in place.

He was down in the City of Mexico and for some \$200.00 to \$300.00 bought a large amount of Spanish furniture.<sup>30</sup>

There was a point when Johnson had tried to convince MacNeilledge to accompany him to Mexico in order to purchase some antiques at relatively inexpensive prices. Because of his incessant business obligations, Johnson never had sufficient time to make the voyage. Having heard the suggestion, MacNeilledge continued to consider the idea a good one and made repeated attempts to have Johnson go with him. In August 1928, MacNeilledge was commissioned by Johnson to go to Spain and Italy instead. In his three months there, he bought a great deal of furniture and decorative pieces, most of which was used in furnishing the Main House and Annex.

Several glossy picture books of Spanish furniture and interiors had been published in the 1920s, many of which Albert Johnson had purchased for his library. Two of the books Johnson owned, Harold Eberlein's Interiors, Fireplaces and Furniture of the Italian Renaissance (New York, 1916) and Arthur Byne's Spanish Interiors and Furniture (New York, 1921-25), contained plates that focused primarily on the interior and its furnishings.<sup>31</sup> That can also said to be true for the buildings of Death Valley Ranch as a whole, most particularly the Main House. The greatest skill MacNeilledge possessed was his flair for designing furniture and interior fixtures. He had probably never been formally trained and never registered as a license architect with the state of California. His technical abilities as an architect were simply not as expert or pronounced.

Although he was not directly charged with any of the responsibilities of design or construction, Thompson had a great deal of experience in this area. His two years of school in engineering schools combined with his experience with the laying out of subdivisions outside of Tacoma and Berkeley, to sufficiently equip him with the skills necessary with certain project needs at the Ranch. In November 1929, his abilities in this area were formally recognized. He was officially charged with designing all "necessary structures not of architectural importance, such as culverts, tunnels, manholes, subterranean buildings, etc."<sup>32</sup>

MacNeilledge, experienced essentially as a furniture designer and interior decorator, probably possessed a greater sensitivity for the use of individual materials and their craftsmanship than he did with general engineering and architectural principals. This greater sensitivity for the use and handling of materials is visibly evident in the design and construction of the Death Valley Ranch complex.

The Ranch has four particular design elements that stand out as being most prominent. They are the use of wood, primarily redwood; the stucco finishes; the use of ceramics, particularly in the form of tile; and finally the amount of hand-forged or wrought-iron hardware. In this case the lighting fixtures are of particular note.

Most of the custom designs utilizing these materials were primarily accomplished by MacNeilledge; albeit with the help of the draftsmen he employed and the craftsmen commissioned. There were times that MacNeilledge sub-contracted with outside individuals, but this did not often occur.<sup>33</sup>

### Stucco

One of the first things to meet the visitor's eye when he arrives at the Ranch is the muddy brown and creamy beige two-tone exterior stucco finish. The underlying darker coat is intermittently revealed, exposing several rows of trowel marks.

This particular treatment was one of the first orders of business MacNeilledge set about formulating. Within a month of signing his first contract, MacNeilledge requested that Thompson send him fifty pounds of sand from the site "for testing to see if it's suitable for purposes in mind."<sup>34</sup> By the following October MacNeilledge was hoping to sometime soon send Johnson an example of what he proposed for the house along with the instructions for its applications.<sup>35</sup> Towards the end of the month Johnson wrote an urging letter from the construction site.

We should have the plaster finish for the commissary rooms together with full details as to color and character and texture. The lack of this material is holding us back especially on the completion of the power room . . .<sup>36</sup>

A few days later MacNeilledge fulfilled his promise.

The colors are to be used as follows: all exteriors of both buildings to have No. 18 finished as sample, which is a float finish with a top dash brushed down with a broom, then to have a brush coat of the light no. 48 which will have a **weathered adobe effect** [emphasis mine].

As was the case in almost everything at the Ranch, age was highly sought after. Whether it was real or simulated did not matter. More import was how it appeared. In other words, the effect was more important than the reality.

Included in the same correspondence were the instructions necessary for the preparation of various undercoats for different building surfaces, generally either concrete or hollow tile.

When two thirds of the Main House was stuccoed, MacNeilledge visited the Ranch and could report the following to Johnson.

I am pleased with the color and texture. It was quite a struggle to get the desired effect as it had never been done before, but I feel sure you will approve of it when you see the building.<sup>37</sup>

By the following June, MacNeilledge had devised the basis for the interior finishes of the Main House and Annex. They were to be treated in a separate fashion. MacNeilledge conceived of four separate types of plaster finishes, each to be defined by its texture. He termed these Mexican, Latin, or Spanish. The fourth variety was named Travertine. This one was reserved for certain exterior areas such as balconies. In some cases it was to be scored to simulate stone blocks. Each of these categories would have variations within them as to basic coloration. The color was determined by mixing different stuccos and the texture was achieved in its application.<sup>38</sup>

Certain difficulties arose, however, because of the many intricacies involved. The work suffered because of a constant turnover among the work crew. Having different plasterers, each with their own method, working on different buildings, and sometimes on the same building, resulted in some unintended but visible inconsistencies. Complications also arose from the fact that the Ranch was purchasing stucco from at least three different suppliers. Matching the product of one distributor to another often took extra pains and effort.

#### Wood

MacNeilledge liked redwood primarily for its color.<sup>39</sup> Although it is not the only type of wood used at the Ranch, it does predominate since it is generously used in areas of high visibility. It is consistently utilized as an exterior building material in the form of doors and doorways, window and door lintels, gates and porches. Many interior ceilings were finished with redwood.

Redwood is used throughout the Ranch as an interior and structural material as well. It can be found in the form of hand railings, roof rafters, beams and trusses. Although the redwood roof trusses of the Living Hall have required extensive rehabilitation in recent years, this was due to poor connections, not the material itself. [See Main House/Annex, HABS No. CA-2257 A.]

As with other materials, the "antique" was a highly sought after quality. All the wood in the construction of the Ranch was specially treated to increase its appearance of age. In the case of wood, first it was gently burnt with an alcohol blow torch. The softer growth rings would burn faster than the harder ones. As a result the grain became more pronounced and accentuated the surface's texture. The wood was then gone over with a wire brush lightly to remove the soot. As a final step it was stained and waxed.<sup>40</sup> The process itself was always referred to by the workers and architect as "antiqueing."

Much of the interior woodwork has been decoratively carved. Some rooms, particularly in the Main House and Annex, feature engraved Spanish mottoes and floral patterns appropriate to the local terrain. MacNeilledge used these devices to "lend a great interest to the interior as ornament and [as an] appropriate sentiment of the desert."<sup>41</sup>

Other kinds of specialty woods were utilized, such as eucalyptus for a pole trellis over the courtyard next to the Main House and cedar for the roof shingles of the Lower Vine Ranch House and its outbuildings. Douglas fir was used for much of the wall and roof framing.

### Metalwork

Some of the metal hardware and lighting fixtures found at the Ranch was custom-designed by MacNeilledge and those under his employ. Once the design was completed, the production of it was then commissioned to several different individual craftsmen and specialty shops in the Los Angeles area. MacNeilledge turned to different manufacturers for different needs, indicating that each had a particular specialty.

The lighting fixtures are perhaps the most ornate examples of metal work on the Ranch. Most of them were produced by Julius Dietzmann Ironworks in Los Angeles. It was not unusual for MacNeilledge's draftsmen and those of Dietzmann's to collaborate on their designs.<sup>42</sup> Lighting fixtures were of a special-enough status to warrant men in Dietzmann's employ to come to the Ranch in order to install them.<sup>43</sup>

Many of the lighting fixtures and in particular the barn gates utilize desert animal imagery -- such as the bobcat, roadrunner and snake -- in their design.

Other pieces of metal work, especially those not immediately visible, were ordered from stock or produced on site. If a piece arrived that was improperly made there were facilities available at the Ranch to modify them. The metal work was burnt with a torch, generally on site, to give it "an antique appearance."<sup>44</sup> The process was very similar to that used for wood.

Full lots of hardware and decorative pieces were shipped to the site and never installed. They have been accessioned by the museum staff, but as of yet have not been catalogued. Once a single example of each type has been catalogued, duplicates can then be used as replacements, should the need arise.<sup>45</sup>

### Tile

The prolific use of tile is characteristic of the Death Valley Ranch. A small portion of the tile was imported from Spain, while the remainder was fabricated in the Glendale area just outside of Los Angeles, a center known for its for tile-making from 1920 until 1950. Although not to the same degree, the area retains a number of tile-making enterprises even today. Many of the tiles made locally for the Ranch were designed to resemble and imitate the "Spanish Style" so popular in Southern California at the time.<sup>46</sup>

MacNeilledge did the designs and then found shops and craftsmen in the Los Angeles area to perform the work. In January 1927, MacNeilledge ordered the first full traincar-load of tile. By then he had devised three separate tile categories in terms of their purpose.

All the floor tile, exterior tile, and ornamental tile have been ordered. They are all hand made and require about 2 months to make. I am sure you will agree with me they are most unusual.<sup>47</sup>

The exterior tile was used primarily for roofing and the floor tile was employed inside and out. The ornamental tile had a colored glazing and was generally used for decorative purposes only. As with the ironwork, the production of different categories of tile were contracted to different shops and suppliers. Because there were so many various suppliers, it is difficult to determine which company made the tile used in each particular instance. A list of known suppliers follows this section of the overview.

Much of the tile ordered for the swimming pool and the area around it was imported from Spain, following MacNeilledge's buying trip to that country in late 1929. The Spanish tile caused some complications, for at one point MacNeilledge had to send a list of Spanish translations to the site so that the workmen could understand what was stamped on the back of the tile, and thereby know where the tile was to be placed.<sup>48</sup>

Since roof-tiling required no cement or mortar it was very different from setting tile on floors or walls, and therefore required a different type of craftsman. One of the tile-setters from 1926-1927, Joseph Forcella, was interviewed and remembers working on the Castle. Forcella recalls how MacNeilledge would inspect the work about twice a month and gave the tile-setters just enough work to keep them occupied until next he returned. There were never any drawings or plans put to paper that were ever shown to the workmen. If MacNeilledge did not like the way the accomplished work turned out he would often have it torn up and redone.<sup>49</sup>

All the tile was coated with a liquid wax before it was set in place. Only the upper face of the tile was treated in this manner. This prevented any grouting or plaster from sticking to the surface of the tile. It was important not to get any wax on the sides or on the under face of the tile, as this might have an adverse effect on the tile's proper bonding.<sup>50</sup>

The tiles themselves ranged in size from 6" x 6" to as large as 12" x 12". Those that had a glazed finish were susceptible to "crazing." The term "crazing" refers to the spiderweb-like cracks that develop in response to fluctuations in temperature. Most of the tilemakers of the day added talc to the glazing mixture in order to prevent this from happening.<sup>51</sup>

Once delivered, most of the tiles were "backed off." This term refers to how the workmen would take a chipping hammer and bevel the back edges of the tile. It was important to achieve a level and flush plane once the tile were set in place. Because the tile was often either warped or of uneven widths, the

beveled edge made it easier to manipulate each tile and achieve this level surface.<sup>52</sup>

MacNeilledge specified in his instructions that all the finished joints were to be convex, which added considerably to the time it took to accomplish the work. The tile-setters poured the grouting through a funnel. Once it had been allowed to set and gain a little body, they then tooled it with a specially prepared hacksaw blade; a different blade was used for a differently sized bead or joint. As one tile-setter remembers, because of these particular specifications, it took three times longer to accomplish the grouting than it took to set the tile itself.

Normally the tile-setters would wait until all the other craftsmen had finished before they would start on a room. It was very important that no one walk on the tiles just after they were put in place. Each step of the process was normally followed with a two-day waiting period, sometimes more, to let the materials properly cure and to effect a strong and durable bond. The first step was to lay a "float-bed" for the tile to rest upon, normally consisting of a four-to-one mixture of sand to cement. The grouting consisted of a three-to-one sand to cement ratio, which resulted in a slightly richer mixture. The richer mixture was easier to smooth out and to achieve a slicker surface.

Next the tile itself was laid in place. Calculations on where to lay the tile had to be very exact because it was essential that the end result be "full-tile," meaning no cuts or half-size pieces along the edges. The grouting in between the tile varied in size from 3/4" to 1" in width.

A tremendous amount of tile was purchased, shipped to the Ranch and never utilized. Most of it was intended for the swimming pool and the areas surrounding it. What remains today is stored in the tunnels besides the pool. A project to catalogue all these tiles is now underway and partially completed.

#### Work Organization

Sometime before September 1926 MacNeilledge had suggested to Johnson that Thompson should be replaced with someone more experienced and familiar with "actual building construction." In reply Johnson wrote:

You suggested to me the possibility of getting a man that was more familiar with actual building construction than Mr. Thompson and thought possibly the man who had made the estimates for you would be a good man and would also be available. It was not my idea to supercede Mr. Thompson but to let Mr. Thompson have general supervision and oversight, looking after the office and outside work and have the man suggested, or some other, in immediate charge of the work on the house . . .<sup>53</sup>

With that directive began a basic division of supervision that remained in place until all construction ceased altogether. Thompson's official title became General Superintendent. He was instructed to report to Johnson by mail once, and if possible twice, a week. These reports, meant to keep Johnson informed of all progress made at the Ranch in his absence, began as soon as Thompson arrived at the Ranch in November 1925, and well before this division of labor became official. Other personal employees working for Johnson made regular progress reports, and it must have been something he generally felt was very important.

In December 1926, the reports Thompson sent to Chicago took on an added dimension, for it was that point that he started to illustrate them regularly with photographs. The photographs were sent with amazing consistency and they proved a real joy to Johnson. Because of his continuing business responsibilities he could not be at the Ranch as much as he would have liked and could not witness for himself the construction of his new house and home. Thompson became intrigued with many different photographic practices and within a few years became quite an adept amateur. His photographs fill at least two full albums that the Johnsons compiled. They included several stereoscopic and panoramic views.

The other supervisory position was formally titled Building Superintendent and was established at very near the same time that Thompson started taking construction photographs as a normal part of his routine. Having a second supervisor might have allowed Thompson more time for other duties, such as the photography he so adamantly pursued.

At least four different men filled the position of Building Superintendent. The first was F.X.A. Kreil, who probably assumed his position in October 1926.<sup>54</sup> He wrote directly to MacNeilledge on a regular basis, who often wrote directly back. In April, MacNeilledge fired him, following a visit to the Ranch because of "numerous mistakes he had made."<sup>55</sup>

In Kreil's place MacNeilledge installed H. Brewster Brown. Brown had been working at the Ranch since that January as a carpenter. It seems, however, that most of his previous work experience had been with masonry. He held this position for three years and became a very trusted employee of Johnson's. At one point he composed a design for one of the buildings at the Ranch. It was never built, but still survives. Brown left his position in anger, because Johnson would not allow him to go to Los Angeles a week or two before the summer shut-down to undertake another temporary but lucrative job prospect.<sup>56</sup>

Chris J. Johnson was given the position shortly after Brown quit. He had been employed as a carpenter since June 1926. Once officially in charge, Johnson, like Kreil, would often communicate directly with MacNeilledge.

In order to be able to reduce wages without encumbering any hostilities or bitterness the present crew was fired in February 1931. An entirely new crew of workers was hired and a new building superintendent, W. D. MacLean, was hired to replace Johnson soon thereafter. MacLean had a substantial amount of

previous construction experience using concrete, which Thompson thought very important at that point.<sup>57</sup> This is understandable in light of the fact that almost all the projects then underway (i.e. Swimming Pool, Entrance Gates, West Patio) primarily involved concrete. MacLean continued to hold this position until all construction ceased in August 1931.<sup>58</sup>

The building superintendent spent most of his time working directly on a particular project, as well supervising the work of everyone else. Although MacNeilledge, as the architect, was primarily responsible for the hiring of the skilled craftsmen, there were times that the building superintendent would assume the responsibilities of hiring and firing. A separate foreman, besides the building superintendent, would manage the manual laborers, mostly Indians, whose assigned tasks, like fencing the perimeter, would often take them a good distance from the main complex. They were not trusted by Johnson to work without direct supervision.

The building superintendent's authority was equal to that of Thompson's as general superintendent. The pay for each of the positions was comparable; Thompson was paid \$400 a month and the building superintendent \$70 a week. Thompson was primarily responsible to Johnson. The building superintendent, however, was directly responsible to MacNeilledge in almost all matters. Having two individuals with equal authority led to a certain friction between the two. In 1927, MacNeilledge noticed:

[T]hat there is a little dissension between Kreil and Thompson which I hope to adjust when I go up next week. I may find it necessary to replace Kreil or instruct Thompson not to interfere with the building supervision.<sup>59</sup>

In November 1929 a complete reorganization of the work force was implemented at Johnson's behest. It was at that point that the Building Superintendent was made directly responsible to the General Superintendent. Scott had spoken with Johnson and Thompson about this reorganization, in which he had quoted Henry Ford: "You cannot have two or more heads running the same enterprise. Always there must be some one man whose authority is final."<sup>60</sup>

At the same time the Building Superintendent was made completely responsible for all hiring and firing. The earlier practice caused some problems. Because MacNeilledge did not live on the site he was not always aware of the labor needs of the Ranch and would at times send up men whose skills were not currently needed.<sup>61</sup>

The work-team principle was still being utilized, as it had been under Kropf. Over time, however, it became increasingly more specialized and formal. Beginning in December 1925, Thompson, as part of his responsibility for recording the payroll, would put a capital letter by each employee's name to indicate the kind of work that was performed. Ten different team categories were developed. They were carpentry, grading land, chauffeurs (hauling),

masonry and concrete, blasting, excavating, fence construction, plumbing and pipe laying, cooking and wiring.<sup>62</sup> In this way several different stages of several various projects could all be on going simultaneously.

By January 1928 Thompson drew up a new and more definitive list of labor categories -- which he labeled "Schedule of Labor and Classification" -- that superseded the previous one. The revised list had a total of seventeen categories and included, except for a couple, all of those previously mentioned. It did add, however, those of supervision, plastering, drivers and stablemen, farming and domestic labor, lathing, office employees and roofing. Masonry and concrete were further divided into four separate classifications: tile, stone and mosaic work; concrete foundations; concrete sidewalks and floors; and masonry (not otherwise classed). Although the headings of blasting and fence construction were dropped,<sup>63</sup> these areas of work continued to be performed and were probably accounted for under other headings.

This major re-organization was probably precipitated by the dramatic increase in the number of employees, as well as the increase in the amount of work ongoing at the Ranch. It was at this point that Johnson employed more people than at any other time. The bi-weekly payroll record for December 16-30, 1927, listed the names of ninety men and exceeded \$5,000.<sup>64</sup> This was about a thousand dollars more than the weeks before or since, but was indicative for that particular construction season and the three seasons after. The payrolls for years 1927 through 1930 were \$64,000 or more. The years 1925, 1926 and 1931 were all less than half that.<sup>65</sup>

#### Employees and Camp Life

Working conditions under Thompson varied. For the first several years under his supervision an eight-hour day was the standard. In March 1929 a nine-hour day was instituted, and in response several Indians quit.<sup>66</sup> The construction season varied somewhat from year to year. Generally the Indians began working in September and the white crew started work in October.

Construction was temporarily suspended every year because of the summer heat, usually in August, from two to four weeks. Sometimes the winter cold or heavy snow would force Thompson to halt work until conditions improved. Winter shutdowns of this type did not occur every year and generally did not exceed a week in duration.

As mentioned earlier a strict segregation between white and Indian employees was rigorously enforced. Any white found visiting the Indian camp was immediately fired.<sup>67</sup> Living conditions between the two groups varied to a degree. Room and board, including a full three meals a day, were provided for all the white employees, the costs of which were deducted from their wages. Most of the men lived in crude temporary structures made of anything available (e.g. corrugated sheet metal). Often, however, there was not enough housing to accommodate everyone and some men were forced to sleep in the open air.<sup>68</sup>

The Indians, however, provided their own tents or wickiups and established their camp just beyond the boundaries of Johnson's land, the location of which varied from year to year. They must have also provided their own food for no deductions for such are recorded in the weekly payroll. They did at times purchase food and sundry items from Thompson, but only on an irregular basis.

For a few years at least, the Ranch supplied itself with fresh eggs and raised its own turkeys and chickens. The remainder of the food supplies were shipped by train to Bonnie Claire from either Tonopah or Los Angeles. There were no cows on the Ranch, so all the milk they used was from a can.<sup>69</sup>

Johnson vehemently opposed any drinking at the camp. There were, however, three incidents when the problem of carousing and drinking was so extreme that a whole group of men, both white and Indian, was fired and the entire camp closed down temporarily.

In September 1930, Johnson imposed further restrictions on all those working for him. Thompson reported the following the implementation of Johnson's wishes.

All employees have signed new working agreement including a clause permitting us to inspect all cars leaving camp, and also to the effect that men interested in prospecting will not be retained on the job. No men under 24 years old are employed, and we have cut off the aged ones, as per our talk.<sup>70</sup>

Why Johnson felt all these precautions were necessary is unclear. Nonetheless, Johnson was fully aware that the depression put a great many men, especially in the building trade, out of work and that the situation could be worked to his advantage. In fact, Johnson had the present crew fired and an almost entirely new work force hired in September 1930 for the sole purpose of reducing the rate of pay for each position.

The work started up in full force again yesterday morning, at a total reduction in wages amounting to more than \$25.00 a day under last season's schedule. Carpenters are now getting \$6. a day and board and Indians \$3. without board. Other men have been reduced in proportion, and all seemed to take the reduction in good spirit.<sup>71</sup>

The firing of one crew and the hiring of another was repeated in February 1931 to again take advantage of the falling wage scales as a result of the depression. The turnover of employees was incredibly high, enough so that Scott, more the front man and the astute witness than the participant, had been known to say that it took three crews to make any progress: one coming, one going and one working.<sup>72</sup>

### Landscaping

Before Johnson took possession of the land in Grapevine Canyon, much of it had already been cultivated. Found within the grounds were various fruit trees (e.g., pear and apple), a grape vineyard and a fig orchard. The vineyard and the fig trees were located south of the garage and were irrigated and tended by the work force.<sup>73</sup> Scott often made his own wine and canned his own figs. It is uncertain when these particular features were lost or destroyed, but they were still producing fruit as late as 1930.<sup>74</sup>

Before a formal landscape plan was devised, it was a common practice to move and transplant trees to locations thought more suitable.<sup>75</sup> Thompson had previous landscape design experience and had hopes that he would be assigned the tasks of landscaping the Ranch. In October 1926 Thompson wrote E.W. Moyers, the manager of the Shadelands Ranch, Bessie's childhood home outside San Francisco, asking advice about nurseries and where one could obtain ornamental trees and shrubbery appropriate for Death Valley Ranch.<sup>76</sup> As late as March 1931, Thompson still harbored hopes that he would have the chance to finish the landscaping at the Ranch.

Naturally I am much interested in the landscaping problems at the ranch, having followed that profession myself, as you know, for several years.

During my few days stay here in L.A. this week I am taking the opportunity to inspect many very fine examples of landscaping near here, especially cactus gardens.<sup>77</sup>

As had happened when Thompson prepared his schemes for the remodeling of the Main House, Johnson passed over him and hired someone else. By 1929 Dewey R. Kruckeberg was selected as the landscape architect for the Ranch. MacNeilledge and Kruckeberg worked very closely together in preparing the layout of the grounds. It seems likely that Kruckeberg was a friend or associate of MacNeilledge's and that Kruckeberg was recommended for the position by MacNeilledge.

Kruckeberg had worked for Theodore Payne Nurseries, Los Angeles until September 1929 and then began an independent career as landscape architect. Perhaps his commission with the Ranch was lucrative enough to influence him in his career move. In any case a great deal of planting had already been accomplished at the Ranch by that time. In fact Thompson wrote to Kruckeberg to inform him that four varieties had died since they were first set out. Eight others, however, continued to live.<sup>78</sup>

By 1928 a local stone known as Jasper was being purchased from local mines.<sup>79</sup> Its most prominent use had been for the waterfall in the Living Hall of the Main House.<sup>80</sup> Much of the actual stonework was done by Kruckeberg himself

and a Mr. Keil, a man sent up to the Ranch by Kruckeberg. Keil lived at the Ranch and was put directly on the Ranch's payroll. In one of his many regular progress reports to Johnson, Thompson appraised Mr. Keil's abilities in the following manner: "[Keil] is I believe Mr. Kruckeberg's right hand man and has been trained in Mr. Kruckeberg's methods and style of landscaping."<sup>81</sup> What those methods or that style were can only be judged by the results themselves, for little is known about Kruckeberg personally or other designs he might have been responsible for.

In 1930 many large trees and cacti were transplanted to the Ranch, some from as far away as Arizona. Kruckeberg made at least two trips in his car to Arizona, "somewhere east of San Bernadino," to locate some Saguaro Cacti. Kruckeberg hoped to hire Tolson, a local truck-driver, to haul these to the site. It seems that Thompson suggested as an alternative having one of the Ranch's own vehicles follow Kruckeberg. Once located, dug up and prepared for travel, the cacti would be hauled back to the Ranch.<sup>82</sup>

The Saguaros were eventually planted in a low relief terrace in between the Guest House and the Garage.<sup>83</sup> None of this original terrace survives today, perhaps because it was only meant as a temporary solution. It seems as though the Saguaro did not do well at this altitude and climate, for none survives at the Ranch today.

Kruckeberg designed a mounded rock-lined watercourse to replace the terrace in the area between the Guest House and the Garage. Work on it began in October 1930 and was completed the following winter.<sup>84</sup> The finished work included two large pools and approximately 110 feet of rock-work on either side of a babbling man-made stream. A locally discovered petroglyph was moved to the site and incorporated into the design. It stands just to the south of the stream's west end and its final fall before disappearing underground. The relocation of this petroglyph and other large boulders required the use of thirty-foot caterpillar tractors, large trailers and as many as five workers at a time and several man-hours to accomplish.

Other watercourses similar in design were planned but never constructed. Excavation for one, slated to emerge from behind the Guest House and to cross the Entrance Court east of the Main House, was started but did not get very far.<sup>85</sup> This watercourse was to empty directly into the swimming pool. A third was planned as a feature just west of the diving platform at the northwest corner of the swimming pool. Neither the diving platform or the watercourse ever got beyond the planning stage.

Other plantings throughout the grounds included the introduction of full-grown olive and palm trees. Three Washingtonian Palms were shipped to the Ranch by Tolson from San Bernadino. They were planted in the early part of March 1930 as the central focus of the entrance court east of the Main House.<sup>86</sup> Plans included having the three trees surrounded by a low relief terrace whose borders would be delicately defined by a very simple row of small stones, but that was never accomplished. All three trees died because of the severely cold temperatures during the winter of 1938-39.<sup>87</sup>

Olive trees were procured from George Webster's olive ranch in San Bernadino and also shipped to the Ranch by Tolson's flatbed truck: "The first olive trees are on their way up and are expected to arrive today [April 10, 1930]. Kruckeberg will supervise their planting."<sup>88</sup>

The Gospel Foundation inherited the ownership and caretaking responsibilities of the Ranch from Johnson after his death in 1948 and began a program of adding some greenery of their own. Mary Liddecoat, the president of the foundation and principal caretaker, would transport oleanders to the Ranch in her car, each time she drove up to the Ranch from Los Angeles. Over the course of a several-year period, Liddecoat was able to border many walkways and buildings with oleanders, most of which still survive today. She would occasionally also bring some cacti to plant in the beds just south of the Guest House, to replace those that had died.<sup>89</sup>

Liddecoat and the Gospel Foundation might also be responsible for the many palm trees that were added after Johnson's death and that dot the present landscape, particularly those near the Stables. Those east of the Garage and in front of the Motel were added after the NPS took control, replanting those that grew wild near the Stables.

The Entrance Court was covered with asphalt during the Gospel Foundation's administration. This might have been accomplished close to the time that the wishing well was covered with tile and the additions to the Gas Tank House and Service Station were built.

### Fencing

One very unusual and distinguishing feature of Death Valley Ranch is its concrete post fencing. One estimate calculates that over 4000 of these particular posts were made on site and used to define the perimeter of the lands Johnson made claim to.

As early as January 1926, eight-foot reinforced concrete posts were manufactured at the Ranch. Thompson briefly described the process, probably after his initial experience with it.

[The implement room of the shed] makes a fine space for curing concrete posts. We have made five of them, with four reinforcing rods, and they look good. I stamped the branding iron circle-J on each of them. This way of making posts is about perfect I think, as the shaking system makes a compact and dense concrete of great strength.<sup>90</sup>

All the concrete fenceposts were made on site, usually by Indians, utilizing the "D & A Post Mold System." This system was manufactured and marketed by "D & A Post Mold Co." of Three Rivers, Michigan. G. H. Dougherty was listed on the letterhead as Secretary.<sup>91</sup> The steel fencepost molds were filled and

covered with sawdust or straw to better cure the concrete. The molds, once full, were shook for some unknown length of time to settle the cement and make it more compact.<sup>92</sup> Some of the fencepost molds made by the D & A Co. still survive and are presently stored in the Stables.

As the needs for enclosing additional lands increased, Thompson tried to have the crew make a daily quota of ten to twenty posts.<sup>93</sup> Once the new gravel bunker in the wash southwest of the main complex was operational the scene of making these posts was relocated nearby. Stockpiles of unused fenceposts still survive near the gravel bunker, in various states of decay. Some have been requisitioned by the NPS in the early seventies for the reconstruction of fences throughout the grounds.

Three different basic types of posts were formed. The majority of them were rounded with one side flattened. The second most numerous of them were those used for supplemental bracing. These were completely square and much broader in width. They were generally used either as corner posts or as gate posts. A smaller proportion of this latter category were formed with small triangular shelves attached to them to support horizontal cross beams, for locations that required even greater strength.

In March 1929 three-foot extensions for the molds were purchased.<sup>94</sup> This allowed for the production of eleven-foot as well as eight-foot posts. Thompson felt that because the bottom three feet would be buried below grade, the seams these extensions caused would not be visible and therefore not mar their appearance.<sup>95</sup> The eleven-foot type was preferred for the Upper Ranch because it was thought that they would lend a greater protection to Johnson, his wife and his guests.

All the work involved with the fencing itself was done primarily by Indians. One crew would dig the holes and set the posts while another would follow behind stringing the wire. Most of the posts were set fifteen feet apart. In other instances they were set as close as twelve feet and as far as twenty-five feet. The spacing usually depended on the amount of protection each location required. Steep hillsides far from a road or regular traffic did not need to the posts as closely spaced as those directly next to a gate or beside a traveled roadway.<sup>96</sup> Either three or five strands of barb wire were strung between posts for most of the fencing. Those areas closer to a gate or a road were furnished with woven-wire fencing. Like the spacing of the posts, the amount of traffic the location witnessed normally determined the amount and type of wiring it received.

Much of the fencing was set along very steep hillsides. In order to transport the fenceposts they were placed on a steel plate devised by Thompson. The device was known as a "steel fence-post sled" and hauled in place by mules. The device was "eight feet long with three steel runners on the bottom made of wagon tire steel."<sup>97</sup>

Almost every fencepost was stamped with a "brand" characteristic of the Ranch. The earliest posts were stamped only with a circle J, the first initial of Johnson's name. Very few of these survive today. Almost all of the earliest fenceposts were either lost in floods or decayed over time.<sup>98</sup> Later a circle S, representing Scott, was added. At first the J was always above the S, but at some point this was reversed. It is unclear why this decision was made, unless it was to further enhance Scott as the pre-eminent figure in the construction of the "Castle."

### Tunnels

Another distinguishing attribute of the Ranch is its network of underground tunnels. An attempt was made to link each of the individual buildings with seven-foot high underground concrete passageways. A few were actually completed, while some simply come to a complete dead-end.

Like most things at the Ranch, construction of the tunnels was accomplished in phases. When a new building was nearing completion, excavation for a full underground passageway and all the necessary services would normally follow.

Plans for a tunnel system were being discussed and constructed as early as February 1927. But the purchase of a steam-powered shovel in 1929 expedited matters tremendously and was primarily responsible for much of what was actually accomplished.

The principal purpose of these tunnels was to facilitate the installation of all the necessary services.

I find it will be necessary to make a tunnel to serve [the servants' quarters] from the present patio tunnel in order to install the steam pipes, electric conduits, hot and cold water pipes, drains and sewers, and this tunnel will also contain the service pipes and drain from the grotto fountain.<sup>99</sup>

Having all the piping and all the conduits exposed and easily accessible made for easier and more convenient repair as well.

Other more fanciful accounts that tried to explain the purpose of these tunnels purported that they were so the help could move from one building to the other without being seen on the grounds and attracting undue attention, an emergency shelter in case of attack, a hiding place for Scott's gold, and perhaps the very entrance to the secret mine Scott so often boasted he had.<sup>100</sup>

Johnson must have been familiar with the tunnel system of Chicago's downtown Loop. This in turn might have provided him with the original inspiration for such a system at the Ranch. Construction of Chicago's subterranean network, begun in 1907, included a narrow-gauge railcar system for the underground transportation of freight and fuel. By 1914 there were sixty-two miles of tunnels and approximately 650,000 tons of freight being delivered through

them. The primary objective was to alleviate the daily congestion within the streets of downtown Chicago.<sup>101</sup>

Certainly congestion was not a problem at the Ranch. Perhaps, however, Johnson was taken with the idea and wished to have something similar for himself for no other reason but that he liked the idea. Although perhaps only coincidental, it is interesting to note that the house Johnson acquired on Lake Michigan was built by and purchased from Albert G. Wheeler, the developer of the tunnel system in Chicago.<sup>102</sup> The house had a tunnel of its own from the Main House to the garage.<sup>103</sup>

Because the tunnels were not a matter of "architectural importance" MacNeilledge was never involved in its design or construction. Although Johnson often gave his ideas and, at times, directions, it was Thompson that was probably most responsible for their layout: "I [Thompson] am working out the various problems involved in the proposed tunnel under the lake and dam, the lake drainage, pipes, etc., and will soon send you cross sections, profile and plans of same . . ."104

#### Land Ownership Thrown Into Question

In the late 1920s proposals to make Death Valley a component of the National Park and Monument system were increasingly coming to the fore. On July 25, 1930, President Herbert Hoover signed Executive Order 5408. This order withdrew over two million acres of land from the public domain pending the outcome of further park studies. Within months U. S. Government surveys were mapping the as-of-yet-uncharted lands within the valley. The survey team, headed by U. S. Transitman Roger Wilson, used Death Valley Ranch as a base camp and supply station, often purchasing food and equipment from Thompson.<sup>105</sup> Wilson kept Thompson informed of the survey's progress and findings. In December 1930 Wilson apprised Thompson of an "unexpected situation" that "might possibly throw the [new] township line right through the main house instead of a half mile south of it."<sup>106</sup>

The following January, Wilson explained to Thompson in great detail precisely what the situation was, Thompson immediately recounted it to Johnson.

Mr. Roger Wilson, U. S. Transit man, was just in and explained to me the status of the survey. He says that under his present instructions the survey will place the township line north of the main house about one half mile, thus making all the improvements fall into the Park limits. This situation is caused by the wide discrepancy between Surveyor Bond's Saline Valley survey of 1880 and Surveyor Baker's Death Valley survey of 1884 which latter survey throws every corner one mile north and one mile west of where the corners would be if the 1880 survey were projected easterly. The 1884 survey is so incorrect that it might be advisable to throw it out entirely and bring in new lines from the 1880 survey from Saline Valley, but this

cannot be done without instructions from the higher officials in the land department at Washington D. C. . . . If you could influence the General Land Office in Washington to order this to be done it will straighten out the situation here so that the Saline Valley survey will govern and thus throw all the improvements north of the park boundary line. But Mr. Wilson says that this will have to be done quick to have any change made in his present surveys.<sup>107</sup>

Wilson, like all government surveyors, was tied to a method of surveying that had been honored since the days of George Washington. Any circumstance such as this, where there are two surveys with a sizeable discrepancy, usually calls for a comparable treatment. Unless something was done the land in between the two already-recorded surveys would be sectioned off into irregular lots, enough so that the new section lines join the corner of the one preceding survey to the corner of the other, and the Ranch's lands would be included in the National Monument.<sup>108</sup> Although Johnson was advised by Thompson and a surveyor/lawyer, Ed Giles, that Johnson's "squatter's rights will give you precedence over the Death Valley withdrawal, so that you will get the land you improved, regardless of the position of the township line,"<sup>109</sup> he needed to find out additional information to be sure of what this would mean.

One week later Johnson planned to go to Washington D. C. himself to meet with Senator Oddie, Congressman Arentz and others to see what he could find out personally. Johnson met with Horace Albright, director of the National Park Service, on February 18, 1931. Johnson explained that his land and improvements might be located within the park boundaries, but as of yet he wasn't sure. Albright suggested that Johnson find out, prepare a description of the land and send it to him. Albright promised to have drawn up and executed a Presidential Order restoring the land for entry. In other words the land would be in the public domain once again and open to a new claim.

The meeting proved somewhat beneficial for Albright as well. While there Johnson, more familiar with the Valley than Albright, suggested that he redraw the park's boundaries farther south to include Silver Lake. At the same time Johnson recommended certain sections of the Valley that would require new roads if they were to be traveled safely by tourists.

Later that same day Johnson had dinner with Sam Arentz, a Nevada Congressman and frequent visitor to the Ranch. Arentz mentioned to Johnson that if all else failed, "he would have a special bill introduced into Congress giving [him] the privilege of locating on the land [he] wanted and buying from the government at \$1.50 per acre."

The following day Johnson visited the General Land office and met with several individuals involved with the ongoing park boundary survey. In the many discussions that ensued Johnson uncovered some important information. He

learned that once the land was restored for entry, the solution offered by Albright, a 91-day period would follow where war veterans would have preference over Johnson for filing a claim.<sup>110</sup>

Such uncertainty about the continued ownership of the land must have caused Johnson to rethink his plans for the Ranch. In February 1931 Johnson instructed Thompson to close the camp for a two-week period and to meet him in Los Angeles to discuss operations at the Ranch. One specific goal was to establish a lower wage scale for all workers at the Ranch. Thompson investigated present wage scales in the Los Angeles area and believed they could get workers of the same or better quality and still save \$50 a day.<sup>111</sup>

An entire new crew would replace all those presently working. A new construction foreman, W. D. MacLean, was hired to replace Chris Johnson. Two of the characteristics that drew Thompson to MacLean was that he has "had much experience as superintendent of construction of reinforced concrete buildings . . . and no false sentiment against letting the weakest man go about every two weeks."<sup>112</sup>

The connection between the problems with land ownership and MacNeilledge's dismissal are unclear, but they certainly do coincide.<sup>113</sup> Perhaps Johnson felt constrained by time and money and wanted an architect that would deliver his drawings on a more timely basis. Perhaps, even more simply, everything Johnson wanted or could hope to finish had been designed and he no longer needed any additional design work performed.

It was not too long after MacNeilledge's dismissal and the hiring of an entirely new crew that construction ceased altogether. The final payroll was dated August 23, 1931.<sup>114</sup> Although the most often heard reason for the shut-down has been the effects of the depression on Johnson's finances, the uncertainty of Johnson's continued ownership of the very land upon which he built seems a more likely explanation. The very fact that both the gravel separator [See HABS No. CA-2257 J] and the solar heater [See HABS No. CA-2257 K], were greatly expanded in 1930, well after the stock market crash, seems sufficient to disprove that the immediate effects of the depression caused the shut-down.

In February 1933 President Hoover signed the proclamation making Death Valley a National Monument, and the lands it encompassed contained those of the Ranch. In August 1935 President Roosevelt signed H.R. 2476, allowing Johnson the right to buy the land in question. In this manner Johnson avoided the possibility of someone with greater priority from claiming the land before. It was not until November 1937, however, that the patent was actually issued and the 1,529 acres actually purchased and exchanged.

Johnson Suffers Serious Financial Reverses

The Depression did not immediately affect Johnson's fortunes and directly cause the sudden and final cessation of construction. In fact it was four years after the crash on Wall Street when the nation's economic condition actually caught up with him and his project. In 1933 the National Life Insurance Company went into receivership. Johnson had invested a large proportion of the company's assets in banking, an activity that was hit especially hard in the 1930s. National Life had purchased over 12,000 shares of Continental Illinois and Johnson was one of its directors. Shares of Continental sold for as high as \$1,400. After the crash it sold for as little as \$17.<sup>115</sup>

The heavy investment Johnson made in a rayon factory in Burlington, North Carolina, only compounded matters. The plant, under construction for several years, never opened and never produced a yard of fabric. The two million dollars Johnson invested included personal and company funds and failed to return a single cent.<sup>116</sup> Much of the money used to finance the rayon venture came from National Life. When National went into receivership, the plant, along with the life insurance company itself, was put on the auction block. National was eventually awarded to Sears, Roebuck and Co. and renamed Hercules Life. The plant was included in the exchange.<sup>117</sup>

Some explanations claim that Johnson's fascination with the Castle, the desert, and the isolation the two afforded, caused his economic downfall. Johnson had built his hideaway in such an eccentric location because he did not want neighbors and because he regularly felt the need to escape the incessant pressures of the business world.

Johnson's absences from Chicago were keenly felt at the office. The Castle had no telephone and the nearest telegraph station and post office was twenty-five miles away in Bonnie Claire. When matters of great importance surfaced at work Johnson could not be reached. The day-to-day management of the company fell to those who were less able to handle the situation that arose.

Some of those who were closest to Mr. Johnson feel sure that if he had attended more closely to business and had not been away and had not been away so much of the time in California he would have averted the collapse of National Life. [There are many who] feel certain that he was canny enough that he would have unloaded in time had he been on the job to sniff the financial atmosphere.<sup>118</sup>

The big fact is that a businessman, address 29 South La Salle Street, saw the valley and became enamored of it to the point where it meant more to him than the money changers and the monkey business of La Salle Street, and spent a great deal of time in the Valley . . . maybe too much time for the good of the business that he owned.<sup>119</sup>

Although Johnson lacked a steady income once the life insurance company was sold he did retain substantial private property holdings: the homes in Chicago and Hollywood, Shadelands Ranch and of course the Castle. His financial situation was serious enough that Johnson sold his home in Chicago and would have to develop other sources of revenue. Still a man of great business acumen, Johnson capitalized on what he still had. The house in Hollywood became his principal residence but offered little in terms of income-producing potential. Although the Johnsons were to depend upon it more dearly for an income, the nut and fruit trees of the Shadelands Ranch produced much as they had before the Depression. Only the commercial potential of the Castle itself were yet untapped.

#### Road Building and the Growth of Tourism

In the 1920s Death Valley was being strongly promoted and developed as a tourist attraction. The fundamental requirement to the region's success as such was its accessibility to the public. The growing popularity of the automobile as the public's preferred choice of travel required the building of new roads and the improvement of those already in place, if the area's potential as a public attraction was to be successfully exploited.

Much of the land in Death Valley belonged to the U.S. Borax Company. When the mining of borax became less profitable, the company lobbied for the establishment of the area as a national monument and began developing plans for a luxury resort inside the valley. Although the idea of establishing Death Valley as a national monument was favorably received by Stephen Mather, then the director of the NPS, he was reluctant to act. Mather, himself a former borax executive, thought that if he personally advocated the company's proposal too strongly it would result in cries of foul play and favoritism.

In January 1929 Horace Albright replaced Mather, whose failing health forced him to resign. Although Albright, like Mather, had personal and professional connections with the Borax industry, Albright was less fearful of accusations of favoritism, and proceeded quickly in proposing boundaries and drafting tentative legislation.<sup>120</sup>

At much the same time other smaller interests were developing their own projects. In May 1926 Herman William Eichbaum opened a 38-mile scenic toll-road through Towne Pass and over the mountains bordering Death Valley to the west. The following November, Eichbaum opened his Stove Pipe Wells Hotel, approximately forty miles south of Grapevine Canyon, on the Death Valley floor.

Soon thereafter the U.S. Borax Company financed the construction of the Furnace Creek Inn. It opened to the public in February 1927, 15 miles south of Stove Pipe Wells.<sup>121</sup>

To the east, on the Nevada side of the Castle, new roads were being promoted as well. The Western Good Roads and Tourist Routing Association, and its president Mr. C. C. Boak, were in regular contact with the State Engineer, Mr. Sam S. Durkee. The Association wanted the state highway between Reno and Las Vegas upgraded to Class A standards,<sup>122</sup> which it eventually was.

By 1930 Eichbaum had practically completed the first improved automobile road north through the valley and up towards the Ranch. Its effects were felt at the Ranch.

[The two glaziers] drove down the valley this afternoon, on the road that Mr. Eichbaum has been grading. Mr. Eichbaum and his wife drove up this road from [their hotel] to the Ranch in 2 1/2 hours, and many cars are coming over it lately.<sup>123</sup>

The new Valley road makes it possible to run down to Los Angeles in nine hours.<sup>124</sup>

Eichbaum often told his guests about the "Castle" to the north and suggested they see it for themselves. It was not long after the road was improved that visitors, mostly uninvited, stopped by the Ranch for a quick look and sometimes more. The topic of "visitors" became a topic to be included in most of Thompson's progress reports to Johnson. "Forty to eighty [visitors] nearly every day. We do not feed them, except rarely when Scotty gives certain ones special invitation."<sup>125</sup> The number of visitors grew as tourism became more popular and the access by car less difficult or dangerous. Less than a year after the road was opened Thompson reported to Johnson: "There are about 100 visitors a day driving through here this weekend, because of the double holiday. . . The two hotels in the Valley are turning dozens of people away each night."<sup>126</sup>

At some point Johnson must have realized the financial promise these visitors had, for by 1934 tours were informally conducted of the Main House and Annex. By 1936 tour guides were hired and trained and an admission price of one dollar per person was instituted. Bessie, more so than Albert, administered these tours and was known to conduct a few herself.

We are now employing about a dozen young men and women under a resident manager to act as guides and guards. The girls are dressed in pretty frocks and make the visitors feel comfortable. . . Visitors range from a few a day to as high as 130.<sup>127</sup>

To augment the income derived directly from tour admission charges, Johnson began to sell mementoes. Bessie had written a small anthology of stories about Scott in 1932 entitled Death Valley Scotty by Mabel. In addition she prepared a written guidebook for the tour of the Main House and Annex. It was intended to serve two separate functions; first as a training manual for the many employees hired as guides and second as a keepsake for the paying public. Several sketches of the "Castle" by M. Roy Thompson were included to illustrate the text. In 1941 Johnson had 10,000 guidebooks privately

published, under the business name of the Castle Publishing Company, and made them available for sale to the public as souvenirs.<sup>128</sup>

We placed the books on sale the middle of this month [October, 1941] so have had only five days experience and not very many people going through the castle as yet but have averaged ten books a day. We are selling them at \$1.00 each so it looks as though we would sell at least 1/2 of the 10,000 by the first of May.<sup>129</sup>

Although plans to publish Bessie's anthology of anecdotes about Scott and her life in the desert were set they never materialized, probably because of the intervening events of the Japanese attack on Pearl Harbor the month following the first selling of the other pamphlet.<sup>130</sup>

Johnson also envisioned the potential financial value in postcards and hired a professional photographer, Burton Frasher, to take dozens of large format photographs. Frasher, working along with son Burton Jr., specialized in publishing postcards and often stayed at the Ranch taking photographs of the buildings and grounds, as well as the scenery of the surrounding area. Hundreds of photographs of the Ranch were taken and thousands of postcards were produced and sold. Many of Frasher's postcards are still printed and available for purchase in the gift shop at Scotty's Castle today.

#### The Ranch in Decline

In 1943 Albert's wife Bessie died in car accident going over a mountain pass forty miles south of their Ranch. Albert was at the wheel and had lost control of the car. Bessie was killed instantly. His sorrow over the loss of his wife and life-long companion combined with Johnson's deteriorating condition to make it increasingly hard for Albert to visit and properly maintain the property. During World War II gasoline and tires were strictly rationed. This in turn severely diminished public visitation to the Ranch, resulting in a substantial loss in income. This only served to make the costs of continued maintenance even more difficult to meet.

#### The Gospel Foundation Inherits the Ranch

In 1946 Johnson established a socially oriented charity which he named the Gospel Foundation. He installed Mary Liddecoat as president. She had earned a degree in social work from the University of California, Santa Barbara and was the daughter of one of Johnson's closest friends, Tom Liddecoat. Tom was a wholesale distributor of produce in the Los Angeles area and had established the Midnight Mission on skid row in Los Angeles. Albert was a frequent visitor to the Mission and had known Mary ever since she was a little girl. The Liddecoats often met socially with the Johnsons in Los Angeles and in Chicago, and Mary still remembers visiting both the Johnsons' Chicago and Los Angeles homes.

Johnson named Walter Webb as vice-president. Walter had worked with different insurance companies since 1907 and had joined National Life in 1927 as an executive vice-president. Unfortunately he was next in line to be president of the company had it survived the Depression. Despite this unfortunate occurrence, Webb remained loyal to Johnson and was willing to serve the Gospel Foundation in his memory.

One year after the foundation had been formed, Johnson transferred several properties to them in his will. Besides the Ranch, they would gain control of the Shadelands Ranch and the Hollywood home. The house in Hollywood was used as an office and headquarters. The hundreds of acres surrounding the house at Shadelands was slowly sold off, parcel by parcel. Webb, who was in charge of real estate for the foundation, sold the land only to corporations or businesses with large payrolls, believing that this was best for the community. Even if the sale of the land did not bring in the greatest income immediately, the large number of employees associated with large corporations would live in the area and add to the tax base. Today the immediate area surrounding Shadelands is home to research and corporate parks for many large companies. The last parcel of land was just (1987) recently sold.

Johnson included one definite proviso in the foundation's charter: that all the assets be spent or discharged in Liddecoat's lifetime. Johnson hoped that this would prevent the foundation from straying into programs foreign to what he envisioned. Today they still award a total of \$400,000 a year in grants to needy socially oriented causes.<sup>131</sup>

The Ranch had already been established as a motel and tourist site and the foundation continued to run it as such. The shed was renamed the "Rancho" and the Guest House was renamed the "Hacienda." The Gospel Foundation divided the latter into four separate rooms and rented these out as well. The suites in the Castle itself were available for rent, and of course went for premium prices: \$13 a night with breakfast.<sup>132</sup> At some point the administration found they needed employee housing more than they did motel rooms and they reconverted the "Rancho" for just that purpose.<sup>133</sup>

#### The National Park Service Buys the Ranch

As early as 1933 Horace Albright realized the potential Scotty's Castle might have as an attraction for Death Valley. Although he mentioned it to Johnson in an offhand and jovial fashion when the two first met, it must have seemed somewhat inevitable when it actually happen many years later.

Despite the apparent success of the tours, the Foundation wished to divest itself of ownership of the Castle. In 1970 the Foundation found an interested buyer in its neighbor -- the National Park Service. The very same year the Foundation also donated Shadelands to the city of Walnut Creek for use as a

historic house museum. It seems these divestitures proved very beneficial for the foundation, which was awarded tax-exempt status once they no longer owned these properties.<sup>134</sup>

The National Park Service purchased the Castle and its lands for \$850,000. The funds were made available by the Land and Water Conservation Act of 1965. As the Act prohibited the use of these monies from purchasing furniture, the Gospel Foundation graciously donated these as part of the transaction.<sup>135</sup> By 1972 Scotty's Castle was officially incorporated into Death Valley National Monument.

### PART III. BIOGRAPHIES

#### Albert Mussey Johnson (1872-1948)

Albert Mussey Johnson was born May 31, 1872, into a wealthy Quaker family in Oberlin, Ohio. Albert H. Johnson, Albert's father, was a wealthy banker and financier, with investments in railroads and quarries.

After finishing school in Oberlin, Johnson entered Cornell University in 1892 and earned a degree in civil engineering. While there he met and became engaged to Bessie Morris Penniman, who had transferred from Stanford. The two were married on November 19, 1896, at Bessie's girlhood home, Shadelands Ranch, near Concord, California.<sup>136</sup>

The newly married couple moved into a small home of their own not far from Oberlin, where Albert began work with the Platform Binder Company.<sup>137</sup> Later that same year Albert borrowed a sum of \$40,000 from his father to invest in mining operations in Joplin, Missouri, an area then undergoing an economic boom due to the discovery of zinc.<sup>138</sup> Within a year Albert had received a 500% return on his investment.<sup>139</sup>

From 1888 until 1889 Albert worked with the Arkansas Midland Railway,<sup>140</sup> a company his father partially owned. From 1897-98 Albert was secretary and manager of the Mussey Stone Company,<sup>141</sup> another company partially owned by his father.

In December 1899, Albert and his father were traveling through Utah and Colorado inspecting the potential of several new possible enterprises, principally those related to mining and power generation. During one leg of their journey, the two men were aboard a train that collided with another. The elder Johnson died instantly while Albert suffered a severely broken back. For the next eighteen months Albert was bedridden and basically immobilized. Some doctors did not believe he would live past his fortieth birthday.<sup>142</sup>

Although he would ultimately survive well past the age of forty, the accident left him crippled for the rest of his life. He walked slightly stopped over and with a noticeable limp, due to a baseball-sized callous

that developed towards the base of his back. The injury motivated him to have furniture custom-designed, so as to be more comfortable and easier to stand, and to wear clothing that was slightly oversized so that his callous would not show. One account mentions that he even had some bathroom fixtures specially designed to accommodate his back.<sup>143</sup>

The injury also affected his career. Because of his disability, the rugged travel necessary to inspect mining operations had to be severely restricted.

Instead Johnson focussed his professional efforts more intently on the world of investment finance. After a one-year period as vice-president of the Arkansas Midland Railroad, Johnson, together with E. A. Shedd, a former partner of Albert's father, purchased the National Life Insurance Company and installed himself as its treasurer. By 1906 Johnson was the president of the company and in the same year became president of the North American Cold Storage Company. The latter was a warehouse operation that bought and sold commodities, primarily butter and eggs.

In November 1916, Johnson moved to a new and more splendid home. Built at a cost of \$600,000 for Albert C. Wheeler, this marble mansion sat on the shore of Lake Michigan.<sup>144</sup> Both Johnson and his wife were intensely religious, adhering to a strict fundamentalism. Neither of them drank, smoke, played cards, or attended the theater.

In 1904, Walter Scott was in Chicago seeking backers for his legendary gold mines, and E. A. Shedd and Albert Johnson invested. Despite receiving no return on his investment, and even after the person he sent to the desert to check on Scott reported that there was no gold mine, Johnson continued to invest in Scott. In 1909 Johnson himself went to California to visit him. Although he found nothing in the way of gold mines, the dry weather and outdoor life proved beneficial to his health.<sup>145</sup> Johnson made repeated trips to visit Scott in the desert and by the time he realized that there was no gold mine, he had started to acquire land. Of the 1500 acres he eventually owned, the Steininger Ranch was the most important parcel. Nestled in a spring-fed verdant valley, this was soon to be the site of Death Valley Ranch.

Johnson's business interests prospered in the 1920s, as reflected in the construction activity at the ranch. In the 1930s, Johnson's fortune declined, although he was never a poor man. He moved from Chicago to Los Angeles and spent more time at the ranch. At his death in 1948, he willed most of his fortune and property to the Gospel Foundation, an organization he had founded the previous year.

Walter Scott (1872-1954):

Walter Scott was the youngest of six children. He was born in Cynthia, Kentucky, in 1872 and raised on a horse farm. At age eleven he ran off to Nevada to join his two older brothers, Warner and Bill. His first job after arriving by train was as a water boy for a survey party along the California-Nevada state line, part of which ran close to Death Valley. When the survey was completed Scott found work with the Harmony Borax Works in the valley itself. Scott was an accomplished horseman and eventually was engaged as one of the rough-riders for the Buffalo Bill Wild West Show. Although his engagement with the show lasted for twelve years, it was seasonal employment. When not fully engaged with the show, Scott would return to Death Valley and pick up odd jobs. His connection with the area became so well known that eventually Death Valley became his nickname.

Scott left the show after a disagreement with Buffalo Bill in 1902. His relationship with Johnson started soon thereafter. Although Scott was practically a permanent resident of the Castle, it seems quite evident that his participation in the project was far from direct.

For whatever reason, Johnson felt beneficent toward Scott, and in his will made specific provisions allowing Scott the right to live out the rest of his life at the Castle. Scott died in 1954.

Bessie Johnson (1872-1943):

Bessie Morris Penniman was born in what is now Walnut Creek, California, and raised on her father's fruit and nut ranch, Shadelands. She was one of the 150 freshmen that made up the first entering class of Stanford University, Palo Alto, California, in 1892. After two years of study she transferred to Cornell, where she met and eventually married Albert Mussey Johnson.

In 1915 Bessie underwent a religious conversion at a revival meeting conducted by the evangelist Paul Rader. Bessie later introduced her husband to Rader, which in turn led to Albert's full-fledged support for Rader as well. Bessie's religious fervor was given full vent at the ranch, where she conducted services and gave sermons every Sunday she was there for all the white workmen. It is interesting to note that Bessie's sister, Mary, did much the same thing at Shadelands for the Japanese sharecroppers who worked the ranch.<sup>146</sup>

In Chicago, Bessie was deeply involved in the Chicago Business Women's Alliance. The Alliance, to which Paul Rader was a frequent guest, provided social services for single working women.

In 1943 Bessie died in a car accident at Towne Pass, some forty miles south of the Castle.<sup>147</sup>

Charles Alexander MacNeilledge:

Very little of the architect's personal history is known. Charles Alexander MacNeilledge was born and schooled in Canada. There is no evidence that he was ever trained in or practiced interior or architectural design before coming to the United States. He established a studio and furnishings store in New York before relocating to Chicago and doing the same there. This is probably where Johnson and MacNeilledge met, for in 1921 Johnson hired MacNeilledge to redesign the library in his newly purchased Sheridan Avenue home on Lake Michigan.<sup>148</sup>

Johnson must have approved of the results. In June 1926 he hired MacNeilledge to redesign the main building at his Death Valley Ranch complex. Up until the point when all construction ceased, new plans were continually being developed for remodeling other structures and adding several more.

It was not long after the original agreement that MacNeilledge moved his studio to Los Angeles, apparently to be closer to the Ranch and the many operations ongoing there. Plans for the Ranch continually escalated. In June 1927 MacNeilledge agreed to become Johnson's personal employee and accepted a monthly salary that amounted to just over \$10,000 a year. All expenses for office, studio and drafting assistants were submitted to and paid by Johnson. In July 1927 two new draftsmen were hired, probably because of the increasing workload as a consequence of the additional structures Johnson wished designed and built.

All the costs incurred by MacNeilledge in the procurement of materials or furnishings were to be reimbursed by Johnson. MacNeilledge's payment included a ten percent override as a commission. This basic arrangement remained in effect for the remainder of their working relationship. It seems MacNeilledge took advantage of Johnson's largesse regularly and made it a frequent practice of asking suppliers to pay him directly 10 to 15 percent of the business he placed with them.

Johnson was first informed of this in a letter from the Blue Diamond Company, a supplier of raw building materials, in Los Angeles, California.<sup>149</sup> Johnson then directed Burton P. Sears, an attorney on staff with the National Life Insurance Co., to research the legal parameters of the architect-client relationship. Sears produced a seven-page document summarizing legal cases that pertained to the issue. Sears' final conclusion was that Johnson had no legal recourse in recovering his money or preventing this from happening in the future.<sup>150</sup>

This disclosure probably went a long way in Johnson's decision to renegotiate the financial agreement established between him and MacNeilledge. Why Johnson didn't just fire him and find someone else is somewhat difficult to explain. One could hypothesize that Johnson must

have greatly admired MacNeilledge's work. Perhaps Johnson simply enjoyed him personally enough to endure such a situation. For whatever reason Johnson was willing to bear the expense of having a "cheat" on his payroll.

While under salary to Johnson, MacNeilledge also redesigned the interiors of the executive offices of Johnson's National Life Insurance Co. building, 29 La Salle Street, Chicago. In addition MacNeilledge designed a "Clubhouse" for Johnson's Burlington, North Carolina, rayon factory. The Clubhouse structure was meant as a recreational facility for the executives and employees of the rayon plant Johnson began constructing in 1928. The structure was designed in the Colonial Revival style and still stands today. It is the only architectural design by MacNeilledge, other than the Castle itself, known to exist. Other than the Ranch and the Clubhouse, almost all of his designs were exclusively for interiors.

It seems MacNeilledge's dishonest practices continued well beyond Johnson's first discovery. According to Martin de Dubovay, one of the draftsmen working for MacNeilledge, MacNeilledge constantly double- and triple-billed Johnson for items MacNeilledge purchased. Dubovay also claims that the final straw came when MacNeilledge began forging checks using Johnson's name. MacNeilledge was summoned by Johnson to the Ranch by telegram in the winter of 1931, and by February 1931 MacNeilledge was no longer working on the project. Perhaps his deceitful behavior, combined with his constantly falling behind schedule in delivering his designs, in particular for the swimming pool, precipitated his dismissal. Afterwards, Dubovay was installed as the architect in charge for the last months of the final construction season.<sup>151</sup>

#### Draftsmen:

Of the draftsmen MacNeilledge hired during the course of the Ranch design's, the names of four are known. The first is William V. A. Hansen. Many of the earliest drawings of the Main House bear his name as the delineator. Hansen was married to Alfred MacArthur's daughter Georgianna. MacArthur was a close friend and associate of Johnson's. MacArthur was also a close friend of Frank Lloyd Wright and was probably responsible for introducing the two. MacArthur was a strong proponent of Wright's and probably counseled Johnson to investigate Wright as an architect for his new home and possibly a new office building in Chicago. It seems quite probable that MacArthur's influence with Johnson lead to Hansen's being hired by MacNeilledge. It is equally possible that Hansen was involved in the building of MacArthur's home in Libertyville, Illinois, north of Chicago, also built in the Spanish Style. MacArthur's home was one that Johnson had visited and been greatly impressed with. Hansen's regular employment probably did not continue much past the first year. He was rehired, however, for a three-week period in July of 1928, indicating some form of continuing relationship with the project.<sup>152</sup>

Two draftsmen, Robert DeWitt and R. W. MacDonald, were hired in July, 1927. The latter worked for two and a half weeks and was paid \$150.00. The former was employed for five weeks and received \$375.00 in compensation.<sup>153</sup>

Already mentioned is Martin de Dubovay. Dubovay was trained as an architect in Hungary and emigrated to the United States. After re-establishing himself professionally in Los Angeles he met Johnson by chance at a book store. Johnson noticed Dubovay because of his European accent and because he was carrying some architectural drawings. Johnson approached Dubovay and began explaining about his project in the desert. Ultimately Dubovay was put on the payroll in 1928 for the remaining years of construction. According to Dubovay, he was responsible for the design of the Power House and Chimes Tower (particularly the Medieval elements), much of the furniture, and for some of the metalwork at the Castle. Although his influence was probably strongly felt, it seems that this is an exaggerated account of what actually took place.

At least one independent interior decorator, T. R. Davidson, Los Angeles, was sub-contracted for some design work in November of 1930.<sup>154</sup> Other designers and draftsmen probably worked on designing the Castle. Other than Dubovay, it does not seem as though they were retained for a regular length of time, but rather when the need for production was great.

F(rederick) W(illiam) Kropf ( ? - 1941):

F. W. Kropf was the construction superintendent or foreman at Death Valley Ranch from September or October 1922 until June 1924, and oversaw the construction of the first three structures.

Kropf was trained as a carpenter and moved with his two children from Provo, Utah, to Los Angeles, California, in 1916. His wife had died in 1911. In 1918 Kropf was hired by L. L. Nunn to direct the construction of Deep Springs College, a boys' preparatory school seventy miles northwest of Death Valley Ranch. Kropf had previously worked for Nunn in Provo, Utah, in connection with the electrical generating stations Nunn had established there.

Both Nunn and Johnson had both grown up in Oberlin, Ohio, and had remained friends throughout the years. In 1917, Nunn and Johnson were touring by car, when Nunn spied Deep Springs Canyon for the first time and decided to establish a school there. In those early years, Johnson often stopped at the school on the way to his Ranch in order to have a meal, spend the night or sometimes deliver a sermon. In return, the boys were always welcomed as visitors to the Castle. The school still exists and has a large collection of photographs taken during Johnson's visits to the College and the many field trips by the boys to the Castle.

Milton, Kropf's son, remembers that Johnson often conferred with Kropf about the plans for his own place and generally sought Kropf's advice. In September or October 1922 Johnson hired him and his son to work at the Ranch. A few months later Johnson hired Kropf's daughter, Melba, as the camp cook.

Melba was fired in April 1924 because of a disagreement she had with Bessie. Kropf was let go three months later. Milton recalls how his father had interrupted Bessie during one of her sermons, and believes that might have been the cause for his dismissal. Another possibility is that Johnson had completed the first phase of work and no longer needed Kropf's services.

M(att) Roy Thompson (1874-1962):

In October 1925 Thompson moved to Grapevine Canyon and assumed his duties as general superintendent for construction for Death Valley in October 1925. He retained that position until August 1931, a few months beyond the point when all construction at the Ranch ceased.

M. Roy Thompson<sup>155</sup> was born in Dunlap, Iowa, in 1874. Matt's father, George Washington Thompson, moved with his family to Tacoma, Washington, in 1887. Matt's father dealt in real estate, became owner of a nearby electric railroad and eventually the president of the local Chamber of Commerce. At age 16 Matt graduated high school and enrolled in Rose Polytechnic Institute in Terre Haute, Indiana, to study civil engineering. In October 1891, Thompson transferred to Stanford and was one of only fifteen sophomore students in the university's first entering class. The remainder were freshman. While there he met and dated Bessie Penniman Morris.

Thompson's family lost their money in the Panic of 1893 and Matt was forced to leave school. He returned to Tacoma and was hired as an assistant engineer to help construct the Bremerton Drydock. Soon afterwards he became an assistant to E. O. Schwaegerl, a landscape architect, in laying out Point Defiance and Wright Parks.<sup>156</sup>

In 1897 Thompson was engaged as an assistant engineer for the State of Washington.<sup>157</sup> Four years later he took the position as chief right-of-way engineer for the Northern Pacific Railroad with a territory that included the four northwestern states.<sup>158</sup>

Bessie had left Stanford close to the time that Matt did. She, however, transferred to Cornell University, where she met and eventually married Albert Mussey Johnson. In 1904, the Johnsons, en route to Alaska, stopped in Tacoma to visit Matt and his new wife, Patience. It was then that Matt and Albert met for the first time.

DEATH VALLEY RANCH (Scotty's Castle)  
HABS No. CA-2257 (Page 45)

In 1907 Matt was engaged by Major Edward Bowes, of radio fame, to design and lay out two land developments Bowes was financing. The first project was Regents Park, just outside of Tacoma. Matt, in conjunction with his brother Paul, oversaw the grading of four miles of roads, construction of concrete sidewalks and installation of a water and sewer system.<sup>159</sup> Matt and Paul went on to do much the same for the Thousand Oaks subdivision of Berkeley, California.

With his land development work completed, Matt accepted a position with the Washington State Highway Department. There he designed and maintained many of the roads in Rainier National Park.<sup>160</sup> Two years later Thompson was elected the County Engineer for Pierce County. During his two-year tenure, forty miles of concrete road were constructed in the county. The use of concrete in road construction was still a novel technique and as county engineer he traveled throughout the country studying concrete roads where ever he went.

In 1918 Roy became a member of the Interstate Commerce Commission's Appraisal Board. His office was in Aurora, Illinois, and his duties consisted of estimating the value of the property owned by nine different railroads centered in Chicago. He was a frequent visitor of the Johnsons and attended the same Congregational Church.

In either late 1924 or early 1925 Johnson approached Thompson with his offer of employment as Ranch superintendent and a four hundred dollar a month salary. Johnson must have realized that Thompson's background in laying out subdivisions, landscape design and concrete construction would prove extremely useful for the plans Johnson was developing for the Ranch. Of particular value would be Thompson's professional credentials in land survey and appraisal, for much of Johnson's land acquisition was from the public domain.

After accompanying the Johnsons in their visit to the Ranch in March 1924, Thompson responded favorably to the project as a whole and the role he was to play in it. He requested a one-year leave of absence from the ICC, that was eventually granted. Thompson never expected that his involvement with Death Valley Ranch would last as long as it did, for he hoped to retain his civil service rating and return to work for the government within a year's time. This seems to indicate that Johnson had not formed any specific plans at this early stage and that no one had conceived of how long Thompson would stay on as superintendent or even for how long construction would continue.

When construction at the Ranch ceased in August 1931, Thompson, like the rest of the work force, was presumably let go. Thompson found new employment for the next three years as senior land appraiser for the Metropolitan Water District in California while the Los Angeles Colorado River Aqueduct was being constructed.

In 1940 Johnson hired Thompson to survey some land in Santa Maria, California. The ownership of land was in dispute. While in Johnson's employ, Thompson traveled to the site to check on the title. Expense records for the trip and some related correspondence are on file in the Reference Library at Scotty's Castle.

Other accomplishments by Thompson include the laying out of the Mojave Air Base for the engineering firm of Kisner, Curtis and Wright in 1942. He also laid out the Roosevelt Base on Terminal Island, in San Francisco Bay, for the firm of Holmes and Narver, Los Angeles, California.<sup>161</sup>

In 1947 Johnson got in touch with Thompson in connection with the completion of the swimming pool at Death Valley Ranch. Thompson was due to leave for Japan to oversee a nuclear test for Holmes and Narver and met with Johnson upon his return. Johnson was very ill and confined to his Hollywood home at the time. Johnson died the following January before any plans for finishing the pool could be finalized.

#### PART IV. SUPPLIERS

The Death Valley Ranch project extended over a ten-year period and resulted in more than a dozen buildings and projects. It would difficult at best to pinpoint which supplier furnished which material for which building. Instead a list of suppliers and the kind of materials they furnished is presented here. It should be considered only as a partial list, as it was derived only from those that were recorded in manuscript 7 and 15 of the archives at Scotty's Castle. Other sources probably exist, but would not be as rich or specific in their information. When certain information about a supplier is known it will be included in the individual building form.

##### Cement

Blue Diamond Company, Los Angeles, California.  
Colorado Portland Cement Company, Denver, Colorado.  
Riverside Cement Company, Los Angeles, California.  
Sawyer-Hassett Company, Los Angeles, California.  
Union-Portland Cement Company, Ogden, Utah.  
Utah Sales Company, Ogden, Utah.

##### Construction Machinery

Construction Machinery Company, Los Angeles, California.  
B. Hayman Company Incorporated, Los Angeles, California.  
Frank T. Hickey, Los Angeles, California.  
Smith-Booth-Usher Company, Los Angeles, California.

Doors and Millwork

Pacific Door and Sash Company, Los Angeles, California.  
W. H. Sheidenberger & Sons, Los Angeles, California.

Door and Window Hardware

Sargent and Company, Chicago, Illinois.

Fencing

Harry Baylies, Los Angeles, California.

Hardware and Tools

Union Hardware and Metal Company, Los Angeles, California.

General Building Supplies

Crane Company, Los Angeles, California.

Insulex

Pacific Portland Cement Company, Consolidated, Los Angeles.  
Sawyer-Hassett Co., Los Angeles, California.

Iron Piping

A. M. Byers, San Francisco, California.  
Martin Iron Works, Los Angeles, California.

Landscape Materials

Armstrong Nurseries, Ontario, California.  
Beverly Hills Nurseries, Beverly Hills, California.  
Phyllo Cactus Farm, Hollywood, California.  
Theodore Payne, Los Angeles, California.  
San Fernando Nursery Company, San Fernando, California.  
San Pedro Ranch Nursery Co., Compton, California.  
Roy R. Wilcox & Co., Montebello, California.

Lumber

E. K. Wood Lumber Co., Los Angeles, California.  
Hammond Lumber Company, Los Angeles, California.  
Woodhead Lumber Co., Los Angeles, California.

Metal Lath

Blue Diamond Co., Los Angeles, California.

Metal Work

Artistic Iron Works, Pasadena, California.  
Aztec Forged Hardware Company, Los Angeles, California.  
Julius Dietzmann's Ironcraft Works, Los Angeles, California.  
Earle Hardware Mfg. Company, Los Angeles, California.  
Western Metalcrafts, Los Angeles, California.

Office Equipment

Charles Bruning Co., Inc., Los Angeles, California.

Paints and Stains

Los Angeles Chemical Company, Los Angeles, California.  
Martin - Senour Company, Los Angeles, California.  
Oakley Paint Manufacturing Company, Los Angeles, California.  
W. P. Fuller & Co., Los Angeles, California.

Plate Glass

The Dixon Glass Company, Los Angeles, California.

Reinforcement Steel

American System of Reinforcing (later Soule Steel Co.), Los Angeles, California.  
Blue Diamond Co., Los Angeles, California.  
Union Hardware and Metal Co., Los Angeles, California.

Roofing Asphalt and Concrete Primer

Johns-Manville, Los Angeles, California.

Steel Window Sashes

Detroit Steel Products Co., Detroit, Michigan.  
Fenestra Construction Company, Detroit, Michigan.

Stucco

Blue Diamond Co., Los Angeles, California.  
California Stucco Products, Los Angeles, California.  
Sawyer-Hassett Co., Los Angeles, California.

Tile

Alhambra Kilns, Alhambra, California.  
Hispano-Moresque, Los Angeles, California.  
Gladding-McBean, Los Angeles, California.  
E. M. Rodriguez, Los Angeles, California.  
The Spanish Pottery, Los Angeles, California.

Vitrified Sewer Piping

Pacific Clay Products, Los Angeles, California.

PART V. SOURCES OF INFORMATION

- A. Original architectural drawings: The Reference Library at Scotty's Castle has catalogued over 1,300 original drawings and blueprints related to its construction. Approximately one dozen other drawings by Wright for the Johnson complex are in the collection of Taliesin West in Scottsdale, Arizona. The collection at Scotty's Castle does have large-format color transparencies of the drawings at Taliesin.
- B. Old views: The Reference Library at Scotty's Castle has catalogued over 1,000 black and white photographs, many of which were taken during construction. Of particular importance are the photographs in albums catalog numbers 13,732 and 13,733. These photographs were taken by Matt Roy Thompson as part of his routine responsibility to report the progress made each week to Johnson. Johnson enjoyed these photographs tremendously, put them into leather-bound albums marked "Death Valley Ranch" and often showed them with pride to those he entertained in his home. They illustrated the history of the Ranch from December 1926 until 1931 when all construction stopped.

Burton Frasher, a professional photographer specializing in postcards, started taking views of the ranch sometime in 1930. The collection of the postcards made available for sale is now being catalogued by the National Park Service.

C. Bibliography:

1. Primary and unpublished sources:

- a. Transcribed interviews on file in Reference Library at Scotty's Castle:

Choate, Joseph. Choate was a lawyer who represented Scott in his case with Julian Gerard. Interviewed by Steven Harrison on January 22, 1980.

DEATH VALLEY RANCH (Scotty's Castle)  
HABS No. CA-2257 (Page 50)

Davey, Lloyd. Davey was a workman on the ranch during the 1930s. Interviewed by Gary Hathaway and Steven Harrison on April 1, 1978.

Dubovay, Martin. Dubovay was engaged as a draftsman in MacNeilledge's studio beginning in 1928. He was first interviewed by Ross Holland et al. in June 1972 and then again in 1978.

Forcella, Joseph. Forcella laid tile at the ranch in the early 1930s. Interviewer unknown, May 1971.

Ford, Mrs. Fred. Mrs. Ford is the widow of C. A. MacNeilledge, the architect. Interviewed by Wayne Schultz and Dorothy Shalley on March 5, 1974.

Ford, Melba Kropf. Ford was the daughter of Frederick William Kropf, the first superintendent of construction at the ranch in the early 1920s, and was hired to cook for the workmen for approximately two years during that time. Interviewed by Steven Harrison on January 21, 1980.

Frasher, Burton, Jr. Frasher was the son of Burton Frasher, Sr., the photographer hired by Johnson to take photographs of the Main House for sale as postcards. Interviewed by Steven Harrison on January 22, 1980.

Kropf, Milton. Kropf was the son of Frederick William Kropf, the first superintendent of construction, and had worked at the ranch himself in the early 1920s. Interviewed by Steven Harrison on January 21, 1980.

Liddecoat, Mary. Liddecoat is the president of the Gospel Foundation, which ran the ranch from 1948 until 1970. Interviewed by Susan Buchel on March 17, 1983.

Rice, Merrill. Rice was a frequent visitor of the ranch and had donated a large collection of colored slides taken between 1948 and 1954. Interviewed by Steven Harrison on December 28, 1973.

Sheidenberger, Lee. Sheidenberger and his father were contracted by MacNeilledge to produce much of the woodwork and finishings of the Main House/Annex. Interviewer unknown, February 21, 1973.

Sorensen, Christine. Sorensen was the cook for the Johnsons. Interviewed by John and Vivian Nash on May 9, 1979.

b. Interviews with no transcripts made:

Creech, Don. Creech has been an employee of the National Park Service since 1972. Interviewed by Richard Bernstein, July and August 1987.

c. Thesis:

Buchel, Susan. "Scotty's Home Was Not His Castle: A Historical Study of Death Valley's Lower Vine Ranch, Death Valley National Monument." M.A. Thesis, University of California at Riverside, 1985.

d. Government reports:

Buchel, Susan. "Scotty's Castle Cook House: Historic Structures Report." 1985.

Diessner, Clement P. "Structural Report: Death Valley, Scotty's Castle and Furnace Creek Area." 1976.

Jahns, Edward. "Physical Inventory of Contents: Stables and Environs, Tie Canyon, 'Motel Unit' Garage, Scotty's Castle, Death Valley National Monument." 1971.

Menz, Katherine B. "Scotty's Castle Furnishings, Death Valley National Monument, California." 1979.

e. Manuscripts:

Manuscript 7 -- Death Valley Ranch Papers (1925-1937). For the most part these papers were the files of Matt Roy Thompson during the time he was active at the Ranch. They include only the outgoing correspondence, such as regular progress reports written to Johnson, letters to MacNeilledge the architect, and letters to suppliers, and were by far the most valuable to this research.

Manuscript 12 -- Death Valley Ranch Papers Addendum (1925-1931). This is simply a continuation of Manuscript 7, but because these papers were acquired at a later date they were catalogued as a separate manuscript.

Manuscript 5 -- A. M. Johnson Letters to Death Valley (1926-1932). This manuscript contains a great deal of incoming correspondence to the ranch both from Johnson and from MacNeilledge, almost all of which pertains to construction. These letters were also part of the

Thompson files and cover only the period when he was active.

Manuscript 15 -- Death Valley Ranch Purchase Orders Paid (1922-1931). This manuscript is a seemingly complete record of every purchase made by the ranch during its construction. Unlike Manuscript 7 it does include some records before 1925 and helps shed light on this lesser known period of the ranch's history.

Manuscript 10 -- E. S. Giles files (water rights) (1926-1928). This manuscript relates mostly to Johnson's acquisition of the land now comprising the Lower Grapevine Ranch. Giles was a lawyer and the county surveyor for Esmerelda County. He was hired to oversee matters pertaining to the claims Johnson filed in the area.

Other pertinent manuscripts at Scotty's Castle include correspondence between Johnson and his wife, Bessie, from 1900-1909 (Manuscript 3) and from 1923-1937 (Manuscript 14), and between Johnson and his family from 1899-1910 (Manuscript 2).

2. Secondary and published sources:

Butti, Ken and John Perlin. A Golden Thread: 2500 Years of Solar Architecture and Technology. Palo Alto, California: Van Nostrand Reinhold Company, 1980.

Hitchcock, Henry Russell. In the Nature of Materials: The Buildings of Frank Lloyd Wright, 1887-1941. New York: De Capo Press, 1979.

Johnson, Bessie. Death Valley Scotty by Mabel. Death Valley: Castle Publishing Company, 1941.

Johnson, Russ. Death Valley 1933 Scrapbook. Bishop, California: Chalfant Press, 1983.

Johnston, Hank. Death Valley Scotty: The Fastest Con in the West. Corona del Mar, California: Trans-Anglo Books, 1974.

Lingenfelter, Richard E. Death Valley and the Amargosa: A Land of Illusion. Berkeley: University of California Press, 1986.

Shalley, Dorothy, and William Bolton. Scotty's Castle. Yosemite, California: Flying Spur Press, 1973.

Wheelock, Walt. The Founding of Death Valley National Monument. Death Valley, California: Death Valley Fortyniners, Inc., 1983.

#### PART VI. PROJECT INFORMATION

The Scotty's Castle Recording Project at Death Valley National Monument, California, was undertaken during the summers of 1987-89 by the Historic American Buildings Survey (HABS) division of the National Park Service, and co-sponsored by the Western Regional Office of the National Park Service. Principals involved were Robert J. Kapsch, Chief of HABS/HAER; Kenneth L. Anderson, AIA, Chief of HABS and project leader in 1987 and 1988; and Paul D. Dolinsky, Principal Architect of HABS and project leader in 1989.

The documentation was produced at Death Valley in 1987 by Marlys B. Thurber, architect and supervisor; architectural technicians Matthew Y. Lee (Mississippi State University); Troy D. Thompson (Ball State University); Charlotte A. Throop (Tulane University); and historian Richard A. Bernstein (Cornell University).

The 1988 documentation was produced by Professor John White, supervisor and architect (Texas Tech University); architectural technicians Ronald M. Bailey (Catholic University of America); Gordon B. Bingaman (Texas A&M University); Jan Engle (Texas Tech University); Scott Weston (Columbia University); and historian Holly K. Chamberlain, HABS/HAER Washington office.

The 1989 documentation was produced by Joseph D. Balachowski, architect and supervisor, HABS/HAER Washington office; architectural technicians Sam R. Coker (Auburn University); Kelly L. Donnelly (Virginia Polytechnical Institute and State University); Joseph R. Esposito, landscape architectural technician (University of Texas at Arlington); Mark A. Radven (Texas Tech University); and Lisbet S. Rosshaug (Royal Danish Academy of the Arts, Copenhagen, Denmark, through US/ICOMOS).

This report was researched and written by Richard A. Bernstein in 1987, and edited in the HABS/HAER Washington office by HABS historian Alison K. Hoagland.

Endnotes

Note: This report relied heavily on primary materials available in the Reference Library at Scotty's Castle.

1. Chain of Title. Manuscript 6, box 1.
2. Liddecoat Interview.
3. Original plans on file in xerox room of the administrative offices of Scotty's Castle.
4. Bessie Johnson, Death Valley Scotty by Mabel (Castle Publishing Company, 1941), 156. The article was written by Bessie Johnson in 1932 but was not published until ten years later. She used the pen-name Mabel because that was Scotty's nickname for her.
5. Letter from Albert M. Johnson to Cliffe Merriam dated April 13, 1917. Manuscript 2, box 4.
6. The earliest known reference to the usage of the name Death Valley Ranch is in a letter from Albert Mussey Johnson to his sister Cliffe Merriam dated April 25, 1917. Manuscript 2, box 4.
7. Dorothy Shally and William Bolton, Scotty's Castle (Flying Spur Press, Yosemite, California, 1973), 9.
8. Johnson, 1.
9. Johnson, 1.
10. Johnson, 1-2.
11. Johnson, 2.
12. Letters from Albert M. Johnson to Cliffe Merriam dated April 13 and 17, 1917. Manuscript 2, box 4.
13. Letters from Albert M. Johnson to Cliffe Merriam dated February 15 and July 5, 1921.
14. Letter from Albert M. Johnson to Cliffe Merriam dated September 19, 1921. Manuscript 2, box 5.
15. Melba Kropf Ford Interview, 20; Milton Kropf Interview, 20.
16. Hank Johnston, Death Valley Scotty: The Fastest Con in The West (Corona Del Mar, Trans-Anglo Books, 1974), 105.

17. Sue Buchel, Scotty's Castle Cook House; Historic Structure Report (Privately Printed, 1985), 5; Milton Kropf Interview, 2, 19-20, 23; Melba Kropf Ford Interview, 20.
18. Milton Kropf Interview, 22-23.
19. Melba Kropf Ford Interview, 11; Milton Kropf Interview, 15.
20. Melba Kropf Ford Interview, 26.
21. Milton Kropf Interview, 27.
22. Melba Kropf Ford Interview, 14.
23. Matt Roy Thompson Jr., "Scotty's Castle Was Bessie's Baby" (Unpublished typewritten article, no date), 5.
24. Letter from M. Roy Thompson to Albert M. Johnson dated January 21, 1926. Manuscript 7, box 1.
25. Letter from Albert M. Johnson to M. Roy Thompson, dated February 9, 1927. Manuscript 5, box 3. Johnson sent this letter to Thompson in reaction to an article he saw in a Goldfield newspaper. It was based on an interview Thompson had given while he was in Tonopah. The article mentioned Johnson by name as a Chicago millionaire and insurance magnate and that Johnson and not Scotty was responsible for all the construction going on in Grapevine Canyon.

I was very sorry to see this article there or my name mentioned in connection therewith. Please advise me if you gave out any other interview or mentioned my name in connection with the place to any reporter.

I wish to have it very definitely understood that in the future you are to give out no interviews or any information of any kind, nature or descriptions regarding this place. Any publicity regarding the place in any way, shape or manner, is to be given out by Mr. Walter Scott and by no else.
26. Johnston, 101.
27. Johnston, 104.
28. Johnston, 104-5.
29. Letter from Albert Mussey Johnson to Charles Alexander MacNeilledge dated June 4, 1926. Manuscript 5, box 1.
30. Letter from Albert M. Johnson to Charles Alexander MacNeilledge dated December 30, 1926. Manuscript 5, box 1.

31. Katherine B. Menz, Scotty's Castle Furnishings (Division of Reference Services, Harper's Ferry, Virginia, National Park Service, January, 1979), 13.
32. Letter from M. Roy Thompson to Albert M. Johnson dated November 8, 1929. Manuscript 7, box 9.
33. Bill for services rendered by T.R. Davidson, Interior Architect, dated November 3, 1930. Reproduced in Menz, 15.
34. Letter from M. Roy Thompson to Charles Alexander MacNeilledge dated July 29, 1926. Manuscript 7, box 2.
35. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated October 23, 1926. Manuscript 5, box 1.
36. Letter from Albert M. Johnson to Charles Alexander MacNeilledge dated October 26, 1926. Manuscript 7, box 20.
37. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated November 8, 1927. Manuscript 5, box 1.
38. "Stucco Specifications." Signed by C. A. MacNeilledge and dated June 25, 1927. Manuscript 7, box 37.
39. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated September 14, 1926. Manuscript 5, box 1.
40. Letter from M. Roy Thompson to Albert M. Johnson dated May 20, 1927. Manuscript 7, box 4. Letter from M. Roy Thompson to Albert M. Johnson dated January 26, 1929. Manuscript 7, box 7.
41. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated March 1, 1927. Manuscript 5, box 1.
42. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated October 31, 1928. Manuscript 5, box 2.
43. Letter from Charles Alexander MacNeilledge to Miss Devlin dated July 1, 1929. Manuscript 7, box 8.
44. Menz, 23. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated February 7, 1927. Manuscript 5, box 1. Mrs. Fred Ford Interview. Letter from Charles Alexander Macneilledge to M. Roy Thompson dated November 18, 1927. Manuscript 7.
45. Conversation with Jud Tuttle, Museum Technician, Scotty's Castle, September 1987.
46. Pat Calhoun Interview, December 29, 1982.

47. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated January 31, 1927. Manuscript 5, box 1.
48. Letter from Charles Alexander MacNeilledge to M. Roy Thompson dated February 20, 1930. Manuscript 7, box 21.
49. Joseph Forcella Interview.
50. Joseph Forcella Interview.
51. Pat Calhoun Interview.
52. Pat Calhoun Interview.
53. Letter from Albert M. Johnson to Charles Alexander MacNeilledge dated September 16, 1926. Manuscript 5, box 1.
54. The first mention of F.X.A. Kreil on the payroll is in October 1925. Manuscript 7, box 26.
55. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated February 25, 1927. Manuscript 5, box 1.
56. Letter from M. Roy Thompson to H. B. Brown dated May 20, 1930. Letter from M. Roy Thompson to Albert M. Johnson dated June 6, 1930. Manuscript 7, box 11.
57. Letter from M. Roy Thompson to Albert M. Johnson dated March 2, 1931. Manuscript 12, box 4.
58. Payroll marked "Last and Final Payroll" and dated August 23, 1931. Manuscript 7, box 42.
59. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated February 11, 1927. Manuscript 5, box 1.
60. Letter from M. Roy Thompson to Albert M. Johnson dated November 9, 1929. Manuscript 7, box 9.
61. Letter from M. Roy Thompson to Charles Alexander MacNeilledge dated December 10, 1929. Manuscript 7, box 9.
62. Letter from M. Roy Thompson to Albert M. Johnson dated December 31, 1925. Manuscript 7, box 26.
63. "Schedule of Labor and Classification" signed M.R.T. and dated January 28, 1928. Manuscript 7, box 26.
64. Manuscript 7, box 42.

65. Payroll records for 1925 cover only the months of November and December.
66. Letter from M. Roy Thompson to Albert M. Johnson dated March 6, 1929. Manuscript 7, box 7.
67. Letter from M. Roy Thompson to Charles Alexander MacNeilledge dated April 14, 1927. Manuscript 7, box 4.
68. Letter from M. Roy Thompson to Albert M. Johnson dated September 17, 1930. Manuscript 7, box 12.
69. Melba Kropf Ford Interview, 24.
70. Letter from M. Roy Thompson to Albert M. Johnson dated September 17, 1930. Manuscript 7, box 12.
71. Letter from M. Roy Thompson to Albert M. Johnson dated September 17, 1930. Manuscript 7, box 12.
72. Johnston, 106.
73. Letter from M. Roy Thompson to Albert M. Johnson dated February 28, 1929. Manuscript 7, box 7.
74. Letter from M. Roy Thompson to Albert M. Johnson dated September 24, 1930. Manuscript 7, box 12.
75. Letter from M. Roy Thompson to Albert M. Johnson dated January 24, 1929. Manuscript 7, box 7.
76. Letter from M. Roy Thompson to E. W. Moyers dated October 6, 1926. Manuscript 7, box 2.
77. Letter from M. Roy Thompson to Albert M. Johnson dated March 2, 1931. Manuscript 12, box 4.
78. Letter from Dewey R. Kruckeberg to M. Roy Thompson dated September 28, 1929. Manuscript 7, box 20. The varieties that lived: California Holly, California Lilac, California Cherry, Sugar Bush, Wild Grape, Evergreen Honeysuckle, Pink Cherokee and Bremontia Mexicana. The four varieties that died were California Lilac, Moss Verbena, Verbena Hybrida, and Greasewood. Letter from M. Roy Thompson to Dewey R. Kruckeberg dated September 20, 1929. Manuscript 7, box 20.
79. Letters from M. Roy Thompson to Albert M. Johnson dated February 28, 1928 and March 11, 1928. Manuscript 7, box 6.
80. Letter from M. Roy Thompson to Albert M. Johnson dated June 27, 1930. Manuscript 7, box 11.

81. Letter from M. Roy Thompson to Albert M. Johnson dated February 16, 1931. Manuscript 12, box 4.

82. There is an invoice for a \$200 shipping charge from Cashman & Stromer of Kingman, Arizona. The charge is for shipping "1 Load Cactus from Rudy's ranch south of Yucca, Arizona, to Death Valley Ranch, California." The invoice is dated July 23, 1930. Manuscript 15, box 1, book 3.

83. Letter from M. Roy Thompson to Albert M. Johnson dated June 27, 1930. Manuscript 7, box 11. Letter from M. Roy Thompson to Charles Alexander MacNeilledge dated July 5, 1930. Manuscript 7, box 12.

84. Letter from M. Roy Thompson to Albert M. Johnson dated October 8, 1930. Manuscript 7, box 12. Letters from Dewey R. Kruckeberg to Albert M. Johnson dated January 12, 1931, and February 16, 1931. Manuscript 7, box 20.

85. Letter from M. Roy Thompson to Albert M. Johnson dated September 24, 1930. Manuscript 7, box 12.

86. Letter from M. Roy Thompson to Albert M. Johnson dated May 8, 1930. Manuscript 7, box 11.

87. Johnston, 156.

88. Letter from M. Roy Thompson to Albert M. Johnson dated April 10, 1930.

89. Mary Liddecoat interview.

90. Letter from M. Roy Thompson to Albert M. Johnson dated January 21, 1926. Manuscript 7, box 1.

91. Letter from D & A Post Mold Co. to M. Roy Thompson dated March 19, 1929. Manuscript 12, box 1.

92. The letterhead of the D & A Company mentions the "Shaking System" but does not explain the process any further.

93. Letter from M. Roy Thompson to Albert M. Johnson dated February 20, 1929. Manuscript 7, box 7.

94. Letter from M. Roy Thompson to Albert M. Johnson dated March 17, 1929. Manuscript 7, box 7.

95. Letter from M. Roy Thompson to Albert M. Johnson dated February 20, 1929. Manuscript 7, box 7.

96. Letter from M. Roy Thompson to Albert M. Johnson dated February 20, 1929. Manuscript 7, box 7.

97. Letter from M. Roy Thompson to Albert M. Johnson dated July 20, 1928. Manuscript 7, box 6.
98. The only one that has been found so far is south of the entry road off the main road, about one hundred yards beyond the Entrance Gates.
99. Letter from M. Roy Thompson to Albert M. Johnson dated September 29, 1930. Manuscript 7, box 12.
100. Burton Frasher, Jr., Interview, 21. Lloyd Davey Interview. Johnston, 131.
101. Harold M. Mayer and Richard C. Wade, Chicago: Growth of a Metropolis (Chicago, University of Chicago Press, 1969), 216-8.
102. Johnston, 131.
103. Conversation with Mike Lawrence, Park Ranger, after his visit to the Wheeler-Johnson home, August 1987.
104. Letter from M. Roy Thompson to Albert M. Johnson dated March 31, 1929. Manuscript 7, box 7.
105. Letter from M. Roy Thompson to Albert M. Johnson dated April 10, 1931. Manuscript 7, box 13.
106. Letter from M. Roy Thompson to Albert M. Johnson dated December 30, 1930. Manuscript 7, box 13.
107. Letter from M. Roy Thompson to Albert M. Johnson dated January 16, 1931. Manuscript 12, box 4.
108. Letter from M. Roy Thompson to Albert M. Johnson dated January 27, 1931. Manuscript 12, box 4.
109. Letters from Albert M. Johnson to M. Roy Thompson dated January 23 and January 30, 1931. Letter from Ed Giles to Albert M. Johnson dated January 4, 1931. Manuscript 12, box 4.
110. Notes made by Johnson dated February 20, 1931. Manuscript 19, box 8.
111. Letter from M. Roy Thompson to Albert M. Johnson dated February 10, 1931.
112. Letter from M. Roy Thompson to Albert M. Johnson dated March 2, 1931. Manuscript 12, box 4.
113. Thompson was informed by letter dated February 26, 1931, that MacNeilledge "ceases to be employed on the work in Death Valley after the end

of this month." No additional circumstance were disclosed. Manuscript 12, box 4.

114. Manuscript 7, box 42.

115. Levering Cartwright, "A Sacrifice to Death Valley" (filed under "Albert Johnson in the vertical file), 2.

116. Cartwright, 11.

117. Cartwright, 55-6.

118. An anonymous newspaper clipping from the Department of Manuscripts and Archives, Cornell University Libraries, Ithaca, New York. Copy on file in Vertical Files under "Albert Johnson."

119. Cartwright.

120. Richard E. Lingenfelter, Death Valley and The Amargosa: A Land of Illusion (Berkeley: University of California Press, 1986), 464-5.

121. Lingenfelter, 451-4.

122. Letter from M. Roy Thompson to Albert M. Johnson dated January 13, 1929. Manuscript 7, box 7.

123. Letter from M. Roy Thompson to Charles Alexander MacNeilledge dated March 4, 1930. Manuscript 7, box 10.

124. Letter from M. Roy Thompson to Albert M. Johnson dated May 12, 1930. Manuscript 7, box 11.

125. Letter from M. Roy Thompson to Albert M. Johnson dated April 15, 1930. Manuscript 7, box 11.

126. Letter from M. Roy Thompson to Albert M. Johnson dated February 22, 1931. Manuscript 12, box 4.

127. Johnston, 125.

128. Letter from Kenneth K. Wright, Los Angeles, to Albert M. Johnson dated August 29, 1941. Manuscript 19, box 8. Letter from Albert M. Johnson to Roy O. Day, Progress-Bulletin, Pomona, California, dated October 24, 1941. Manuscript 19, box 5.

129. Letter from Albert M. Johnson to Roy O. Day, Progress Bulletin, Pomona, California dated October 24, 1941. Manuscript 19, box 8.

130. Introduction by Sue Buchel to the 1987 reprint of Death Valley Scotty by Mabel.

131. Mary Liddecoat Interview.
132. Flier with prices of all the rooms printed by the Gospel Foundation in 1951. Manuscript 7, box 42.
133. Liddecoat Interview.
134. Liddecoat interview.
135. Johnston, 154.
136. "Bessie Johnson," Vertical File.
137. "Bessie Johnson," Vertical File.
138. Johnston, 91.
139. Cartwright.
140. Who's Who in Chicago, ed. Albert Nelson Marquis (Chicago: A. N. Marquis Publishing Co., 1926), 460-1.
141. Who's Who In Chicago, 460-1.
142. Lingenfelter.
143. Lingenfelter.
144. Johnston, 103.
145. Johnston, 96.
146. Historical brochure produced at Shadelands. A copy is on file in the vertical files under "Bessie Johnson."
147. Buchel Introduction to Death Valley Scotty by Mabel.
148. Mrs. Fred Ford, widow of C. A. MacNeilledge, Interview.
149. Letter from M. R. Filkins, Assistant to the President, Blue Diamond Company, Los Angeles, California, to Albert M. Johnson dated May 25, 1927. Manuscript 7, box 4.
150. Memorandum from Burton P. Sears to Albert M. Johnson dated June 2, 1927. Manuscript 5, box 1.
151. Martin de Dubovay Interview (1972), 10, 27. "Mr. MacNeilledge ceases to be employed on the work in Death Valley after the end of this month, except as I may make arrangements for his further continuance . . ." Letter from Albert M. Johnson to M. Roy Thompson dated February 26, 1931. Manuscript 12, box 4.

152. Letter from Charles Alexander MacNeilledge to Albert M. Johnson dated July 27, 1928. Manuscript 5, box 2.
153. Letter from Charles Alexander MacNeilledge to Miss Devlin dated August 5, 1927. Manuscript 5, box 1.
154. See invoice dated November 3, 1930, in Menz, I-15.
155. Thompson was originally christened Leroy. His uncle Matt thought it proper that he, like most every one else at that time have three names, and Leroy took the name Matt, but usually signed everything as M. Roy Thompson. He made the name change legal when it became necessary to apply for work with the army during the Second World War.
156. Tacoma Times, September 19, 1935.
157. Gettysburg Times. July 27, 1956.
158. Tacoma News Tribune.
159. Tacoma News Tribune. September 9, 1925, and July 15, 1959.
160. Tacoma News Tribune. September 19, 1935.
161. Desert Magazine. September, 1952.

ADDENDUM TO:  
DEATH VALLEY RANCH  
(Scotty's Castle)  
Death Valley National Park  
Death Valley vicinity  
Inyo County  
California

HABS No. CA-2257

HABS  
CAL  
14-DVNM,  
1-

PAPER COPIES OF COLOR TRANSPARENCIES

HISTORIC AMERICAN BUILDINGS SURVEY  
National Park Service  
U.S. Department of the Interior  
1849 C St. NW  
Washington, DC 20240

ADDENDUM TO:  
DEATH VALLEY RANCH  
(Scotty's Castle)  
Death Valley National Park  
Death Valley Junction vicinity  
Inyo County  
California

HABS CA-2257  
CAL, 14-DVNM, 1-

HABS  
CAL,  
14-DVNM,  
1-

PHOTOGRAPHS

HISTORIC AMERICAN BUILDINGS SURVEY  
National Park Service  
U.S. Department of the Interior  
1849 C Street NW  
Washington, DC 20240-0001