REVISED REPORT

CULTURAL RESOURCES ASSESSMENT

VILLAGE OF ISLAMORADA
PLANTATION KEY/NORTH
PLANTATION KEY
WASTEWATER TREATMENT
PLANT
FLORIDA KEYS, FLORIDA

DHR NO. 2003-1737



Prepared for FEMA Region IV 3003 Chamblee Tucker Road Atlanta, GA 30341

May 2003



URS Group, Inc. 200 Orchard Ridge Drive, Suite 101 Gaithersburg, Maryland 20878 89-FR954414.00

TABLE OF CONTENTS

Executive Su	mmary	ES-1
Section 1	Introduction	1-1
Section 2	Project Area Description	2-1
Section 3	Cultural Setting	3-1
	3.1 Prehistoric Background	
Section 4	Methods	4-1
Section 5	Findings	5-1
	5.1 Records Research5.2 Field Findings	
Section 6	Conclusions and Recommendations	6-1
Section 7	References Cited	7-1
Figures		
Figure 1	Vicinity Map	1-3
Figure 2	Project Area Location Map	1-5
Figure 3	Preliminary Site Plan	1-6
Plates		
Plate 1	Photograph of Project Area 1	2-2
Plate 2	Photograph of Project Area 2	2-2
Appendix		
A 1. A	D CD: 11 /: /	

Appendix A Resume of Principal Investigator

URS Group, Inc. (URS) has completed a cultural resources assessment of two project areas for the proposed Village of Islamorada, Plantation Key Colony/North Plantation Key, Wastewater Treatment Plant, in Monroe County, Florida. The selected site will be developed as outlined in the Plantation Key Colony/North Plantation Key Wastewater System Conceptual Design, developed for the Village of Islamorada, Monroe County, Florida (PBS & J 2002). In response to Hurricane Georges damages and losses, Congress enacted Public Law 106-31, Emergency Supplemental Appropriations Act for Fiscal Year 1999, to fund long-term disaster recovery projects in Florida counties whose needs were unmet through primary disaster relief funds. Monroe County was included among the counties eligible for "Unmet Needs" funding. The Federal Emergency Management Agency (FEMA), State of Florida, and the affected counties determined funding priorities. Monroe County requested that wastewater management improvement projects be considered for this funding since many existing wastewater facilities in the county were not storm-resistant. Moreover, the State recently mandated more stringent wastewater treatment standards for the county. As a Federal undertaking the project must be reviewed in accordance with Section 106 of the National Historic Preservation Act (NHPA) of 1966, as amended, and its implementing regulations 36 Code of Federal Regulations (CFR) Part 800, "Protection of Historic Properties."

The project scope of work for the assessment included a records search at the Florida master Site File system, located in the Florida State Historic Preservation Office (SHPO), and a pedestrian reconnaissance survey of the two project areas. The purpose of the assessment was to assist FEMA's project planning, to ensure compliance with the National Environmental Protection Act (NEPA) and the NHPA, as to provide the Florida SHPO with information on possible impacts to cultural resources pursuant to Section 106. Site files located at the Florida SHPO listed no historic standing structures or archaeological sites within or adjacent to Project Area 1's Area of Potential Effect (APE) (Preferred Site) or Project Area 2's APE (Alternate Site). However, one prehistoric (8MO1479) and one historic archaeological site (8MO2095) were recorded in the SHPO site files within a one-mile radius of each project area's ape. These resources will not be affected by the proposed action.

The archaeological pedestrian survey confirmed both project areas consist predominately of second growth forest, growing on previously cleared parcels. No artifacts or cultural features were identified in either project area APE. No potentially NR-eligible above-ground resources were observed within the two APEs or within their viewsheds. The results of this URS investigation indicate there is little to no potential for cultural resources present within the two proposed APEs, and therefore, no further investigation is recommended.



SECTIONONE

This Cultural Resources Assessment was conducted by URS on behalf of FEMA. The purpose of this assessment was to assist FEMA in complying with the NEPA as well as Section 106 of the NHPA. Consideration of the project's effects is required under Section 106 of the NHPA, as amended, and its implementing regulations 36 CFR Part 800, which outline the procedures to be followed in the consideration of effects on historic properties. For the purposes of Section 106, historic properties are defined as archaeological sites, buildings, structures, districts, or sites that are listed in or are eligible for listing in the NRHP (36 CFR 60.4). Compliance with Section 106 is necessary for any Federal undertaking that has the potential to affect cultural resources. Section 106 review includes identifying historic properties including archaeological sites that may be affected by the proposed actions or any of its alternatives. In cases where the project will result in an adverse effect, Section 106 requires Federal agencies to seek ways to avoid, minimize, or mitigate the adverse effect.

In response to damages and losses caused by Hurricane Georges, Congress enacted Public Law 106-31, Emergency Supplemental Appropriations Act for Fiscal Year 1999, to fund long-term disaster recovery projects in Florida counties whose needs were unmet through primary disaster relief funds. Monroe County was included among the counties eligible for "Unmet Needs" funding. The Federal Emergency Management Agency (FEMA), State of Florida, and the affected counties determined funding priorities.

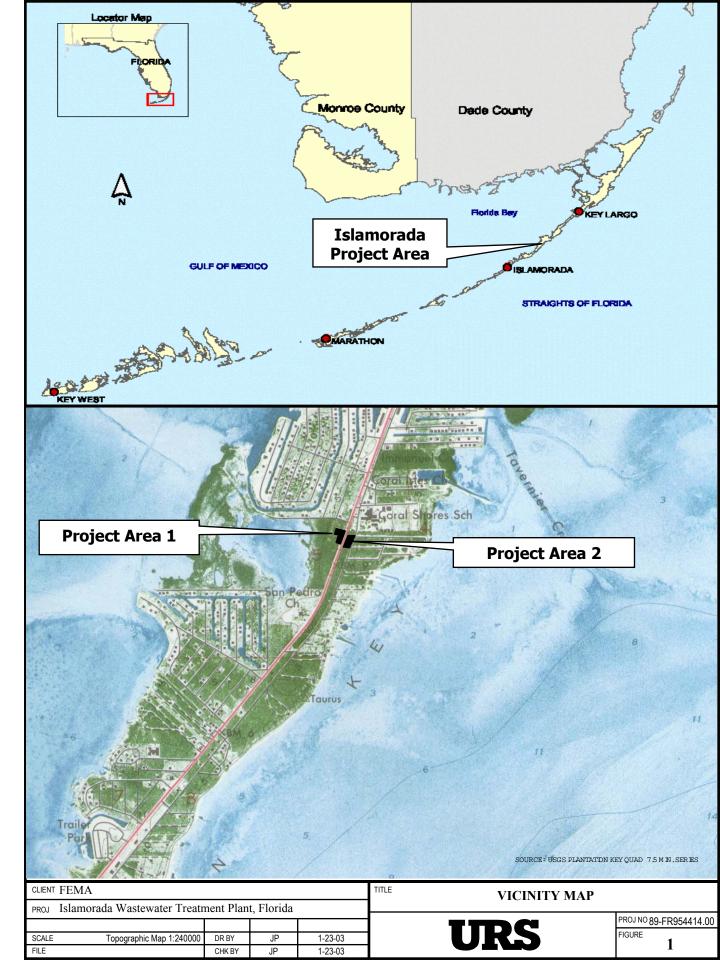
Monroe County requested that wastewater management improvement projects be considered for this funding since many existing wastewater facilities in the county are not storm-resistant. In addition to achieving the Act's long-term disaster recovery goal, these projects were also proposed because of increasing concerns over degraded near shore water quality partly caused by poor wastewater treatment. Moreover, the State recently mandated more stringent wastewater treatment standards for the county. FEMA has received grant applications from the Village of Islamorada (Islamorada) and the Keys Aqueduct Authority (FKAA), requesting Federal assistance to upgrade or replace their existing wastewater treatment facilities.

Project Description

This assessment is based on the proposed construction of facilities and infrastructure presented in the *Plantation Key Colony/North Plantation Key Wastewater System Conceptual Design* (PBS & J 2001). The proposed project consists of two components, a wastewater collections system (WCS) and a wastewater treatment plant (WWTP). The WCS is a vacuum sewer system used to collect and transfer wastewater flow from houses and businesses to the WWTP. Wastewater flow would be conveyed from houses and businesses via gravity lines to a vacuum pit or collection sump located in the center of the roadways within the service area. When wastewater accumulates in the sump, the vacuum interface valve located above the sump would automatically open and differential air pressure would propel the sewage through the valve and into the vacuum wastewater transmission mains aligned along the service area roads in front of the properties to be served. Since all components of the WCS will be sited in previously disturbed areas, the WCS will not be discussed further in this study. This study focuses on the WWTP.

Two areas have been proposed for the WWTP. The Preferred Site is a 0.8-acre parcel, which is known as Project Area 1, and consists of six contiguous lots on the bayside of US Highway 1 (US-1) near mile marker 89.8 (Figure 1). The entire facility will be enclosed by a chain link fence and planted with a landscaped buffer. Access to the facility will be via a gate fronting

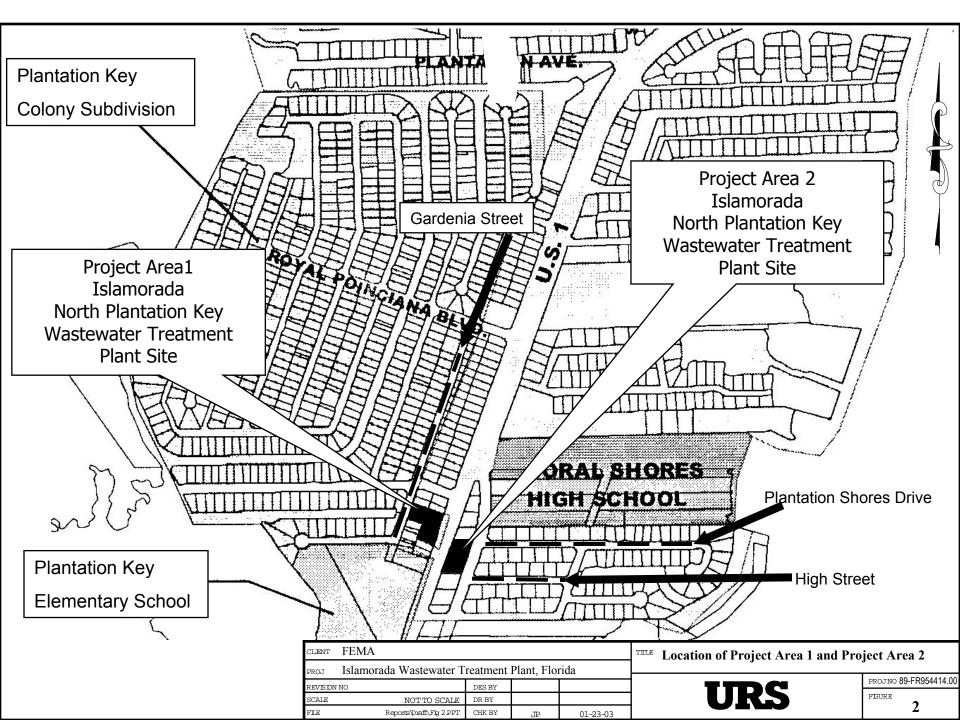


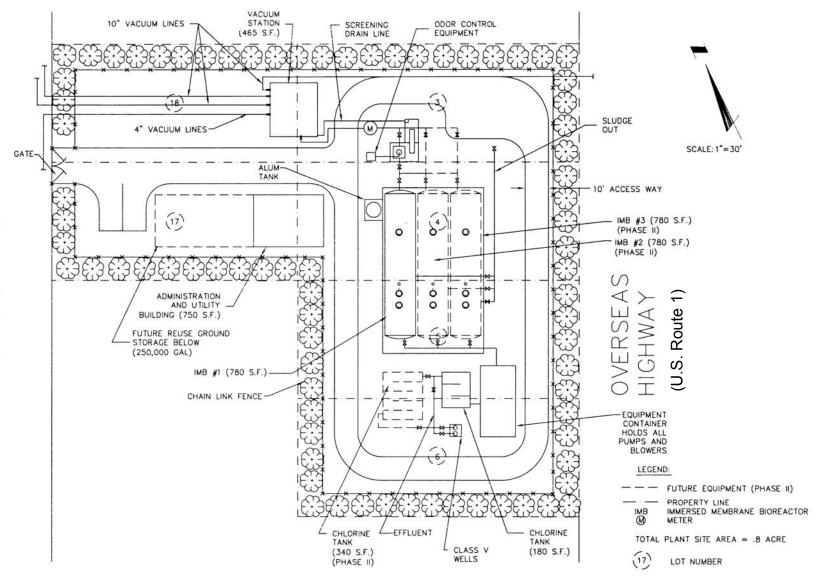


SECTIONONE Introduction

Gardenia Street (Figures 2 and 3). The Alternate Site for the WWTP, which is known as Project Area 2, is located on the ocean or east side of US-1 near mile marker 89.7. This site is rectangular in shape and is slightly more than one acre in size. It is bounded by US-1 to the west, Old State Road 4A to the east, Plantation Shores Drive to the north and High Street to the south. The site is part of a narrow, contiguous vegetated corridor that extends along the ocean side of US-1 (Figures 1 and 2). This site will consist of the WWTP, a vacuum station, storage facilities for maintenance equipment, treatment chemicals, and other operations materials; as well as parking, paved access roads, and landscaping. Under this alternative the WWTP engineering and system design will be identical to the WWTP proposed for Project Area 1.







CLENT	FEMA				Т
PROJ	Islmorada Wastewater Treatment Plant, Florida				
REVISION NO		DES BY]
SCALE	NOT TO SCALE	DR BY	JP	01-14-03]
FLE		CHK BY	JP	01-14-03	1

Plan View of Wastewater Treatment Plant

PROJ NO 89-FR954414.00
FISURE

3

Project Area 1

Project Area 1 is the preferred site for the WWTP, and is situated on Plantation Key in Monroe County, Florida in the Village of Islamorada. The site is roughly L-shaped, and located on six contiguous, vacant lots on the bayside (west) of US-1 on Plantation Key at mile marker 89.8. The long axis of the L-shape is running along US-1(Figure 3). Existing vegetation can be characterized as a remnant hardwood hammock degraded by fragmentation and infestation by invasive, non-indigenous plant species. Observed vegetation species include Brazilian pepper, poisonwood, wild coffee, and Australian pine. The project area soils are derived from limestone bedrock, and at the time of the site visit consisted of a dry, loamy, humic layer with gravels of coral. The project area is essentially flat but does exhibit 15 to 30-centimeter undulations, possibly the result of numerous wind blown tree falls. There are no freshwater sources on site or in the vicinity. At the time of the site visit the project area was characterized by approximately 40 percent ground surface visibility. There are no standing structures in the project area but there are adjacent residences and residences on the opposite side of Gardenia Street. None of these structures appear to be 50 years old or older.

Project Area 2

Project Area 2 is the alternate site for the proposed wastewater treatment plant, and is located on the ocean side (east side) of US-1 at approximately mile marker 89.7. The site is rectangular in shape and is slightly more than one acre in size. It is bounded by US-1 to the west, Old State Road 4A to the east, Plantation Shores Drive to the north and High Street to the south. The site is part of a narrow, contiguous vegetated corridor that extends along the ocean side of US-1 (Plate 2). The existing vegetative communities at Project Area 2 is also characteristic of a remnant hardwood hammock, but appears to be of a higher quality evidenced by the minimal occurrence of exotic plant species within its interior. The current canopy is characterized by Brazilian pepper, poisonwood, wild coffee, and Australian pine, with a sparse understory. The project area soils are derived from limestone bedrock and at the time of the site visit consisted of a dry, loamy, humic layer with gravels of coral. The project area is essentially flat. There are no fresh water sources at the site or in the vicinity. There is approximately 40 percent surface visibility in the project area. There are no standing structures in the project area but there are nearby buildings on the opposite side of State Rout 4A. None of these structures appear to be 50 years old or older.

Project Area Geology

Geologically, both project areas are located within the Upper Keys of the 130-mile long Florida Key island chain on Plantation Key. The Florida Keys are commonly separated into two physiographic areas, the Upper and Middle Keys and Lower Keys (White 1970). The Upper and Middle Keys are formed from a heavily eroded coral bedrock ridge, called the Key Largo Formation, which is generally located 12-16 feet above sea level. The Lower Keys result from a once submerged oolite bank, referred to as the Miami Oolite Formation (Glasgow 1994). Due to numerous lateral fissures and its eroded nature, Key Largo limestone (within the Key Largo Formation) does not retain freshwater. The Miami Oolite formation in the Lower Keys, on the other hand, has fewer lateral fissures and is characterized by the occurrence of freshwater lenses (Carr and Fay 1990). Key soils tend to be alkaline and often less than 10 cm in depth.





Plate 1: Project Area 1



Plate 2: Project Area 2

3.1 PREHISTORIC BACKGROUND

The cultural history for the project area follows the general prehistoric cultural history developed by Florida archaeologists for South Florida. The prehistoric culture periods are outlined below.

- Paleoindian (12,000–10,500 BP)
- Archaic Period (8500–2500 BP)

Early Archaic (10,500–8000 BP)

Middle Archaic (8000-6000 BP)

Late Archaic (6000–2500 BP)

• Glades Period (2500–500 BP)

Glades I Period (2500-1250 BP)

Glades II Period (1250–800 BP)

Glades III Period (800–500 BP)

Paleoindian (12,000–10,000 BP)

The earliest human inhabitants of Florida were Paleoindian and entered the region by about 12,000 years before the present (BP). The Paleoindian period is thought to have lasted through 10,000 BP. Paleoindians are generally thought to have been hunter-gatherers who lived a nomadic existence, following game and exploiting seasonally available plant life. Generally, all that remains of Paleoindian sites are lithic artifacts including blades, projectile points, and other tools and by-products of stone tool manufacture. Because of the high acidity of Florida soils, tools and artifacts made of bone or wood have decomposed at most terrestrial sites. There are, however, submerged Paleoindian sites in Florida, that because of their unique environment contain preserved wood, bone, ivory, and other artifacts not normally encountered in dry land sites (Milanich 1994). The environment during the Paleoindian period was substantially different than that observed today. Based on pollen and fossil evidence, the climate appears to have been much drier (FSHPO 1993). One settlement model currently emerging from ongoing research in Florida, the Oasis Model, indicates the Paleoindian sites are clustered near deep sinks in the karst terrain and around other perched water sources. During this period, the vast glacial ice sheet that covered the northern hemisphere resulted in sea level elevations that were far lower than today. Thus, the Gulf coast of Florida is estimated to have been 40 to 70 miles west of its present location (Milanich 1994). As a result of the subsequent global warming and rising sea level, it is likely that a number of Paleoindian sites are now submerged beneath the Gulf of Mexico and Atlantic Ocean.

The Florida State Historic Preservation Plan suggests that Paleoindian sites that withstood the dramatic environmental shifts of the late Pleistocene period will most likely be found:

- Where erosion has exposed deeper and earlier strata or sediments;
- Where sediment accumulation has occurred at a slower rate;
- Near sinkholes where deep sediments are exposed to the present surface;
- Along the central Gulf Coast, where sea-level rise has exposed Pleistocene limestone outcroppings (FSHPO 1993).



The Florida State Historic Preservation Office's Master Site Files database of archaeological sites records shows only one known Paleoindian site, Grass Key Rock Pit site (8MO1297), within the Keys region. That site is located in Monroe County. Though located some distance from the Keys, the Cutler Fossil Site (8DA2001) in Dade County is considered a significant Paleoindian manifestation in the Everglades cultural area.

Archaic Period (10,000–3000 BP)

The Archaic period extends from about 10,000 BP through about 3000 BP. This period is generally characterized by an increase in the diversity of resources exploited. Fishing, hunting, and gathering were strategies used to procure food. The Archaic period has been divided into three phases by archaeologists, based on stylistic changes in stemmed projectile points and the development of fiber-tempered pottery. The Early Archaic (10,000–7000 BP) is defined by the presence of Dalton, Hamilton, and Kirk serrated projectile points. The Middle Archaic (7000–5000 BP) is characterized by the presence of Marion and Putnam projectile points. Finally, the Late Archaic (5000–2500 BP) is defined by the presence of Clay and Lafayette projectile points, as well as fiber-tempered pottery.

According to the Florida Master Site Files database of archaeological sites, Key Largo 1 (8MO25) is a potential Late Archaic site located in Monroe County. It is the only Archaic Period site listed in Monroe County, and is a multi-component shell midden site. The Cutler Fossil Site (8DA2001) noted above also has evidence of Archaic Period occupation, but located in the Everglades.

Glades Period (2500–500 BP)

From about 2500 BP to European contact during the 16th century, the development of diverse cultural traditions occurred throughout Florida. In south Florida, the Glades tradition is divided into many sub-periods based primarily on differences in ceramic decoration styles. Because chert outcrops are rare in south Florida, lithic artifacts are sparse and other materials such as wood, bone, and shell were used to configure tools. Ceramics during the Glades I period (ca. 2500–1250 BP) are normally undecorated (Glades Plain and Goodland Plain) (FDHR 2001). During the Glades II period (1250-800 BP) ceramic types are characterized by quartz sand and grit temper. The rise of mound building during this time period indicates the appearance of stratified society (Butler 1997). The Glades III period (800-500 BP) included the appearance of punctated, incised, and stamped decoration on pottery, as well as at the end European artifacts (FDHR 2001). During the time period between 1000–800 BP, Griffin reports that there is virtually no occurrence of decorated pottery (1974). In general throughout this period, there appears to be increased trade as indicated by an increase in exotic resources such as lithic tools and ornaments.

The Glades Period is also characterized by a reliance on shellfish and marine resources, as well as hunting and gathering on the land. Generally, there are four types of Glades Period sites: primary habitation, secondary habitation, resources procurement/processing, and mound sites (FSHPO 1993). Important Glades Period sites include the Bear Lake Site (8MO33), Upper Matecumbe Key (8MO17), and Rock Mound (8MO26-27).



3.2 HISTORIC BACKGROUND

Spaniards in search of gold, silver, and other natural resources first arrived in Florida in the mid-1500s, marking the beginning of contact that would forever change, and virtually eradicate, Florida's native cultures. Once the Spanish realized that the riches of South and Central America were not to be found in Florida, they turned their focus to converting the native population to Christianity. Relations with the Timucua, the Guale, and the Apalachee were tumultuous at best, and aspects of this adversarial relationship are reflected in the archaeological record. The building, burning, and rebuilding of missions occurred with confusing frequency (FSHPO 1993). Chaotic relations between Native populations and Europeans were common throughout the southeast. European trade interests exacerbated difficulties and boundary squabbles. Florida eventually became home to the Seminole Indians, who were comprised of Creek Indians from the north who were fleeing British encroachment in that region. In the Keys, the Tequestas and Calusas, two early south Florida tribes, disappeared before the new Seminole population arrived. The Seminoles continue to inhabit parts of Florida today.

European control of Florida vacillated between the British and Spanish during these early years until Florida became part of the United States in 1821 (FSHPO 1993). The first settlers to the Keys arrived just a year later in 1822 at the same time that the United States established the Navy Pirate Fleet in Key West. These pioneers were known as "Conchs" and were largely fisherman who also salvaged shipwrecks along the reefs of the Keys. In fact, "the English 'fisherman' began to grow wealthy from salvaging wrecked ships . . . and the shakier characters were helping the salvage business along by stringing lanterns from palm trees, tricking captains into the shallow water reefs" (Florida Keys Virtual Traveler 2001).

By 1845, Florida gained statehood. During the Civil War, Union forces blockaded Florida's ports and occupied Fort Zachary Taylor. With the economy already faltering, the end of the war only meant difficulty for industries and their recovery due to the vast destruction of infrastructure and the land. It was not until after World War II that the economy began to rebound and Florida's "frontier" period ended (FSHPO 1993). The railroad entrepreneur Henry Flagler helped bring an end to this "frontier" period with his extension of the Florida East Coast Railroad, which extended from Homestead to Key West. Before the rail line's completion in 1912, transportation in the Keys was exclusive to boats. Unfortunately, the rail line was partially destroyed in the 1935 Labor Day hurricane and transportation in the Keys was again limited to boats (Florida Keys Virtual Traveler 2001). Today, the Overseas Highway follows the old Florida East Coast Railroad route to Key West and is the Keys' artery to the mainland.



SECTIONFOUR Methods

The goal of this investigation was to assess the archaeological potential of the proposed project area, focusing especially on prehistoric and historic archaeological resources within the Area of Potential Effect (APE) for Project Areas 1 and 2. Another goal of the assessment was to confirm the absence of historic structures in both project area APEs. The APE for Project Area 1 is considered to be the entire project area which corresponds to six contiguous building lots (lot number 3-6, 17 and 18) located between Gardenia Street and US-1 that encompass a total of 29, 250 square feet (0.8 acres). The APE for Project Area 2 is considered to be the entire project area. The third goal of this study was to assist FEMA's project planning and to ensure compliance with NEPA and Section 106 of the NHPA, and to provide Florida's Division of Historical Resources, in the office of the State Historic Preservation Office, with information on possible impacts to cultural resources.

Background archaeological site records research was conducted on July 29-30, 2002 at the Florida Master Site File System, at the Florida SHPO to gather information on previously identified archaeological sites and historic properties listed, or eligible for listing, in the NRHP. A review of cultural resource management reports for previous projects in Monroe County and the project area vicinity was also conducted.

Archaeological investigations were conducted on July 31, 2002. Pedestrian survey of the project area consisted of visual inspection of the exposed surfaces along transects at 10-foot intervals. Inspection of tree falls and animal burrows was also conducted. No subsurface testing was conducted during these investigations due to the amount of disturbance, the observance of soil profiles in tree throws, and the level of effort defined in the scope. General field notes were recorded in field notebooks. Color digital photographs were taken of the project area. No artifacts were recovered, however, project records including field notes and photographs will be curated at the office of FEMA, Region IV, in Atlanta Georgia.

All phases of the assessment were conducted by staff who meet *The Secretary of the Interior's Professional Qualification Standards* (for archaeology) as outlined in 36 CFR 61. The resume of Principal Investigator is included in Appendix A of this report.



SECTIONFIVE

5.1 RECORDS RESEARCH

A search of the Florida Master Site File system, in the Florida SHPO's office, found no recorded historic properties within either project area's APE. However, two previously recorded sites were found within a one-mile radius. The first site is state site number 8MO1479, the Plantation Key or Wilkinson Mound Site. This site is located approximately one-half mile northwest of Project Area 1. According to the site file this site may be a mound site but was very disturbed by construction of the Plantation Key Colony subdivision in 1952. This site report is based on informant information and a listing of artifacts was not included with the site description. The second site is state site number 8MO2095. This site is located approximately three-quarters of a mile south of Project Area 1 and 2 and approximately 20 meters from the ocean-side shoreline. The site consists of a cistern. Unfortunately, no other description is available. The site likely dates to the late nineteenth or early twentieth century. No previously recorded architectural sites were found within a one-mile radius of the property.

The Florida SHPO does not list a Certified Local Government for North Plantation Key (FSHPO 2003). No informant interviews were conducted. Records searches were unsuccessful in locating detailed historical maps or plats. A search of Sanborn Fire Insurance maps showed no maps were produced for either project area.

5.2 FIELD FINDINGS

A 100 percent pedestrian survey of Project Area 1 was completed on July 31, 2002. At the time of the site visit the project area was characterized by approximately 40 percent ground surface visibility. A total of 12 transects were surveyed. Soils were comprised of a gravelly humic layer and limestone bedrock. No cultural materials or cultural features were observed. There were no standing structures in the project area but there were nearby structures on adjacent parcels. No structure appeared to be 50 years old or older. No potentially NRHP eligible above-ground cultural resources were observed.

A 100 percent archeological pedestrian survey of Project Area 2 was also completed on July 31, 2002. Ground surface visibility was approximately 40 percent at the time of survey. Soils were comprised of a gravelly humic layer and limestone bedrock. A total of 9 transects were surveyed. No artifacts or cultural features were observed within the project during the site visit and pedestrian survey. There are no standing structures in the project area but there were nearby structures on adjacent parcels. No structure appeared to be 50 years old or older. No potentially be NRHP eligible above-ground cultural resources were observed.



In response to damages and losses from Hurricane Georges, Congress enacted Public Law 106-31, Emergency Supplemental Appropriations Act for Fiscal Year 1999, to fund long-term disaster recovery projects in Florida counties whose needs were unmet through primary disaster relief funds. Monroe County was included among the counties eligible for "Unmet Needs" funding. The FEMA, the State of Florida, and the affected counties determined funding priorities.

Monroe County requested that wastewater management improvement projects be considered for this funding since many existing wastewater facilities in the county are not storm-resistant. The proposed project when completed will also increase near shore water quality caused partly by poor wastewater treatment. FEMA has received grant applications from the Village of Islamorada (Islamorada) and the FKAA, requesting Federal assistance to upgrade or replace their existing wastewater treatment facilities. Project Area 1, the preferred alternative, calls for development of a 0.8-acre land parcel in the Village of Islamorada, Monroe County, Florida. Project Area 2 is an alternative site. As a Federal undertaking the project must comply with Section 106 of the NHPA of 1966, as amended.

URS Group, Inc. has completed a cultural resources assessment of both project areas. The purpose of this assessment was to assist FEMA in project planning, and to provide the Florida SHPO with information on possible cultural resources impacts pursuant to Section 106. The scope of work for the assessment included a records search at the Florida Master Site File System, in the Florida State Historic Preservation Office to gather information on previously identified archaeological resources and properties listed in or eligible for listing in the National Register of Historic Places, and pedestrian survey of the project areas.

The Florida SHPO site files listed no historic standing structures within or adjacent to both project areas, and listed one prehistoric (8MO1479) and one historic archaeological site (8MO2095) within a one-mile radius of both project areas. These resources will not be affected by the proposed project. No artifacts or cultural features were observed during pedestrian survey of both project areas. The present URS investigation indicates a little to no potential for cultural resources within the either APE, and therefore, no additional archaeological investigation is recommended.

However, should any unanticipated historic or archeological materials be discovered during project work, all activities on the site shall be halted immediately and the FKAA shall consult with FEMA, SHPO and other appropriate agencies for further guidance. In addition, if a human burial is discovered, Florida's unmarked human burial law will be implemented (Florida Statute Title XLVI, 872.05 Unmarked human burials). Specifically,

"When an unmarked human burial is discovered ... all activity that may disturb the unmarked human burial shall cease immediately, and the district medical examiner shall be notified. Such activity shall not resume unless specifically authorized by the district medical examiner or the State Archaeologist. If the district medical examiner finds that the unmarked human burial may be involved in a legal investigation or represents the burial of an individual who has been dead less than 75 years, the district medical examiner shall assume jurisdiction over and responsibility for such unmarked human burial, and no other provisions of this section shall apply. The district medical examiner shall have 30 days after notification of the unmarked human burial to determine if he or she shall maintain



jurisdiction or refer the matter to the State Archaeologist. If the district medical examiner finds that the unmarked human burial is not involved in a legal investigation and represents the burial of an individual who has been dead 75 years or more, he or she shall notify the State Archaeologist, and the division may assume jurisdiction over and responsibility for the unmarked human burial pursuant to subsection (6) [of Florida Statute 872.05]. When the division assumes jurisdiction over an unmarked human burial, the State Archaeologist shall consult a human skeletal analyst who shall report within 15 days as to the cultural and biological characteristics of the human skeletal remains and where such burial or remains should be held prior to a final disposition (Florida 2003)."



Butler, C. S.

1997 Archaeological Survey of Key West Naval Air Station Monroe County, Florida.
Brockington and Associates, Inc. Submitted to U. S. Army Corps of Engineers, Mobile
District, Contract No. DACW01-94-D-0010, Delivery Order No. 0011. Copies available
in the office of the State Historic Preservation Officer.

Carr, Robert S. and Patricia Fay

1990 Archaeological Survey of the Lower Keys, Monroe County Florida. Archaeological and Historical Conservancy, Inc., Miami.

Florida

Florida Statute Title XLVI, Chapter 872: Offenses Concerning Dead Bodies and Graves. Accessed from http://dhr.dos.state.fl.us/bhp/compliance/index.html. Accessed April 21, 2003.

Florida Department of Historic Resources (FDHR)

2001 Florida Historical context. Accessed from http://dhr.dos.state.fl.us/bar/hist_contexts/www.calch.doc

Florida Keys Virtual Traveler

2001 "History of the Florida Keys." Information on Keys history gathered from http://www.vtraveler.com accessed on February 26, 2001.

Florida State Historic Preservation Office (FSHPO)

1993 State of Florida Comprehensive Plan accessed from http://dhr.dos.state.fl.us/barhistcontexts/comp-plan.pdf

2003 State of Florida List of Certified Local Governments. Accessed from http://dhr.dos.state.fl.us/bhp/compliance/CLG LIST.pdf. Accessed April 17, 2003.

Glasgow, T. Niles

1994 *Soil Survey of Monroe County, Keys Area, Florida.* United States Department of Agriculture, Natural Resources Conservation Service, Washington D.C.

Milanich, Jerald T.

1994 Archaeology of Precolumbian Florida. University Press of Florida, Gainesville.

PBS & J

2002 Plantation Key Colony/ North Plantation Key Wastewater Treatment System Conceptual Design Report. Prepared by PBS & J. Submitted to the Village of Islamorada, Monroe County, Florida.

White, William A.

1970 *Geomorphology of the Florida Peninsula*. Florida Geological Survey, Bulletin 51. Tallahassee.



Appendix A Resume of Principal Investigator

7. Brief resume of key persons, specialists, and individual consultants anticipated for this project. a. Name & Title: **JUSTIN S. PATTON** SENIOR ARCHAEOLOGIST b. Project Assignment: c. Name of Firm With Which Associated: **URS** d. Years Experience: With This Firm 2 With Other Firms 12 e. Education: Degree(s)/Year/Specialization M.A.A./2001/Applied Anthropology B.S./1988/Anthropology Active Registration: Year First Registered/Discipline 36 CFR 61 (Archaeology and History) g. Other Experience and Qualifications Relevant to the Proposed Project **EXPERIENCE SUMMARY**

Cultural Resource Management

Historic Archaeology of the Middle Atlantic Region

Prehistoric Archaeology of the Middle Atlantic Region

Historic Preservation

Section 106 Compliance

Mr. Patton has 13 years of experience in prehistoric and historic archaeology in the Mid-Atlantic, South, and Southwest regions of the United States, and preservation and protection of historic properties in Virginia. A majority of this experience is in cultural resources management (CRM) for private, state, and Federal compliance projects. Mr. Patton has implemented both research-oriented and CRM projects. Projects have included intensive and reconnaissance archaeological and historic resources management services performed in compliance with all federal and any applicable state laws. Specific experience includes report preparation; cultural resources literature research: designing research objectives: public programming and design of temporary interpretive displays; public interpretation; data recovery; and artifact analysis.

Representative examples of Mr. Patton's experience include the following:

Senior Archaeologist, URS Corporation, Gaithersburg, MD. Responsible for management of on-going cultural resources contracts for both private and public clients. Includes oversight responsibilities, as well as supervision of field projects, artifact analysis, and report preparation. All work is closely coordinated with SHPO and clients for compliance with federal and state requirements for cultural resource management. Contracts include:

Federal Emergency Management Agency (FEMA), Hazard Mitigation Technical Assistance Program (HMTAP) and National Infrastructure Technical Assistance Contract (NISTAC). Multi-year contract to complete environmental compliance documents for FEMA prior to new construction in aftermath of natural disasters, and to provide environmental consulting for mitigation alternatives. Various levels of archaeological assessment and field investigations completed in West Virginia, and Delaware.

- Texas Unmet Needs. Prepared Section 106 identification and evaluation for proposed flood control projects (stream channelization) for the cities of Schertz, La Vernia, and for the Guadalupe Blanco River Authority, all of which are located east of San Antonio, Texas.
- West Virginia Flood Disaster, FEMA-1378-DR-WV. Prepared section 106 identification and evaluation for historic properties affected by FEMA temporary group housing program. Prepared memorandum of agreement for the recordation of historic properties condemned as a result of flood damage.
- Delaware City, Delaware. Section 106 identification and evaluation for historic properties affected by FEMA Hazard Mitigation Grant Program.

Federal Highways Administration Woodrow Wilson Bridge Project. Multi-year cultural resource management prior to construction of the new Woodrow Wilson Bridge, Maryland and Virginia. Responsibilities include archival research and archaeological support for extensive Phase I and II investigations. Projects include:

- Various Phase I Archaeological Investigations, Proposed Compensatory Wetland Mitigation Sites in Virginia and Maryland.
- Phase II Archeological Testing of the Virginia Shipbuilding Corporation Site (44AX78) Alexandria, Virginia.

Phase I Archaeological Survey Of The Proposed Unified Communications Center on St. Elizabeth's Hospital Property, Washington, D.C. Prepared for Jacobs Facilities, Inc, Arlington, VA 22209.

7. Brief resume of key persons, specialists, and individual consultants anticipated for this project.

(Justin S. Patton, Continued)

Lab Supervisor/Archaeological Lab and Field Technician, Parsons Project Services Inc., Parsons Engineering Science, Fairfax, Virginia. Responsible for field supervision of Phase I and Phase II excavations in compliance with federal and state guidelines for cultural resources management. Responsible for supervision of field laboratory.

- *SR-1 Delaware Department of Transportation Project*. Supervised field lab where identification and artifact counts were generated to assist in preliminary analysis of archaeological testing.
- Avon Park Air Force Bombing Range, Avon Park, Florida. Supervised Phase I excavation and survey of select areas of Air Force Base.
- *Portners Brewery, Alexandria, Virginia*. Served as Field Technician for Phase II excavation of a ca. 1870 beer brewery.
- The Crossing Site, Freehold, New Jersey. Served as Field Technician for Phase II excavation of a 1760's domestic site.
- 90th Army Reserve Centers. Served as Field Technician for Phase I excavations and reconnaissance survey of 17 Army Reserve Centers in Texas, Arkansas and New Mexico.

Assistant Manager, Cultural Resources Protection Group, Fairfax County Park Authority Fairfax County, Virginia. Responsible for supervision of all fieldwork including reconnaissance survey, Phase I and Phase II excavation. Served as archaeological lab director and supervised all artifact cataloging, analyzing, and conservation of historic and prehistoric artifacts. Responsible for technical review and recommendations for Park development projects. Responsible for recruitment and supervision of volunteers and interns.

- *CRM-1, Fairfax County, Virginia*. Field Director for Phase I and II excavations at Colvin Run Mill, an 1801 water powered grist mill.
- Hunt-1, Huntley Historic Site, Fairfax County, Virginia. Field Director for Phase I and II excavations at Huntley Historic site an 1820's Federal style summer villa.
- Jameson Cemetery, Mount Gilead, Fairfax County, Virginia. Field Director for Phase I trenching to identify an early nineteenth century grave shaft cemetery.
- Sully Structure 2, Fairfax County, Virginia. Field Director for excavations on a eighteenth century slave quarter.
- Sully Dairy House Excavations, Fairfax County, Virginia. Field Director for

Phase II excavations on a late eighteenth century dairy.

- Walney Spring House Enhancement Project, Fairfax County, Virginia. Field Director for Phase II excavations of a nineteenth century spring house.
- Phase II Testing on Huntley Manor's North Dependency, Fairfax County, Virginia. Field Director for Phase II excavations The 1820's summer home of Thompson Mason.
- Marr 1, Fairfax County, Virginia. Field Director for Phase I Testing on a Late Archaic reduction station.
- *Marr 2, Fairfax County, Virginia*. Field Director for Phase I and Phase II excavations on a Late Archaic quartz reduction station.
- *The Taylor Site, 44FX1988, Fairfax County, Virginia.* Field Director for Phase I excavation of an early to mid-nineteenth century farm.
- Green Spring Manor House, Green Spring Farm Park, Fairfax County, Virginia. Field Director for Phase I and II excavations on a 1760's plantation.
- Lee Graveyard Grave Shaft Identification. Field Director for Phase I trenching of the original Lee Graveyard at Sully Plantation, Fairfax County, Virginia.

Archaeological Field Technician, Parsons Engineering-Science, Inc., Fairfax, Virginia. Responsible for field supervision, data recording, archival research, artifact analysis, report writing, and monitoring of construction sites on prehistoric and historic sites in compliance with federal and state guidelines for cultural resources management.

- Continental Gas Pipeline Project, Virginia. Phase II investigations of a prehistoric site in the Virginia Piedmont.
- Martin State Airport, Maryland. Phase I investigations and survey.
- Baltimore Washington Airport, Maryland. Phase I investigations and survey.
- Dulles Airport; UAL hangar, and Air Cargo; Virginia. Phase I investigations and surveying.
- Cloverleaf, Fairfax County, Virginia. Phase II and Phase III excavations of a mid-nineteenth century structure.
- Keith's Warf and Battery Cove (44AX119) Ford's Landing, Alexandria, Virginia. Phase II and Phase III trenching and excavations of an eighteenth century wharf, nineteenth century shipyard, shipway, and marine railway. Including the remains of industrial, and railway outbuildings, derelict barges,

7. Brief resume of key persons, specialists, and individual consultants anticipated for this project.

(Justin S. Patton, Continued)

and derelict ships.

- Potomac Interceptor Extension, Loudoun County, Virginia. Phase I, II and III excavations on prehistoric sites occupied from the Late Archaic through the Historic periods.
- Quaker Village, Alexandria, Virginia. Phase I investigations and survey of historic and prehistoric sites.
- *Harborside, Alexandria, Virginia*. Phase I trenching and excavation of a late eighteenth century wharf.
- Arundel Ridge, Anne Arundel County, Maryland. Phase II investigations of a Woodland prehistoric site.
- Russett III, Anne Arundel County, Maryland. Phase II excavations of four prehistoric sites.
- Greystone Estate, Washington D.C. Phase I investigations of historic and prehistoric sites.
- Navy Yard, Washington D.C. Phase II trenching and excavations of Building 36 of the Washington Navy Yard.
- St. Timothy's Church, Fairfax County, Virginia. Phase I location of unmarked graves on church property.
- Russett III, Anne Arundel County, Maryland. Phase III excavations of a Late-Woodland prehistoric site.
- Jamestown on the Magothy, Anne Arundel County, Maryland. Phase I investigations of prehistoric and historic sites.
- Rock Creek Landing, Anne Arundel County, Maryland. Phase I investigations of historic and prehistoric sites.
- *Montpelier, Prince Georges County, Maryland.* Phase II excavations of an eighteenth century plantation house.
- *Mexico Farms, Cumberland, Maryland.* Phase II excavations on three prehistoric sites.
- McNair Farms, Fairfax County, Virginia. Phase I investigations of a prehistoric site.
- Dulles International Airport, Virginia. Phase I investigations at several historic

and prehistoric sites: Satellite, FBO, Horse Pen Branch, Cain Branch.

- Winkler Tract, Fairfax County, Virginia. Phase I investigations and survey.
- Riversdale, Prince Georges County, Maryland. Phase I investigations of a historic foundation.

Archaeological Field Technician, Longwood College, Summer Field School, Farmville, Virginia. Responsible for field supervision and excavation of prehistoric sites in.

- Excavations at 44BK213, Jordan Site. Survey and excavation of a multi-component historic site in Buckingham County, Virginia.
- Excavations at 44BK212, the Morris Field Site, Buckingham County, Virginia. Longwood College field school, assistant to Principal Investigator and field supervisor of excavations of a Woodland prehistoric site.
- Excavations at 44BK212, the Morris Field Site, Buckingham County, Virginia. Longwood College, field school, survey and excavation of Woodland prehistoric site.