

RFP #11-002

# DESIGN OF TARPON PIER REPLACEMENT FOR CITY MARINA AT GARRISON BIGHT

























## **TABLE OF CONTENTS**

**COVER LETTER** 

**INFORMATION PAGE** 

ORGANIZATION CHART

COMPANY INFORMATION

METHODOLOGY & APPROACH

**PERSONNEL** 

**QUALIFICATIONS** 

REPRESENTATIVE DESIGN PROJECTS & CLIENT REFERENCES

**REFERENCES** 







COVER LETTER



May 17, 2011

City Clerk City of Key West 525 Angela Street Key West, Florida 33040

Reference:

City of Key West Request for Qualifications

11-002 Design of Tarpon Pier for City Marina at Garrison Bight

Dear City Clerk,

EB0005022 AAC002142 The firm of Corzo Castella Carballo Thompson Salman, P.A. (C3TS) is pleased to submit this response to your RFQ for the above referenced project for your review and consideration. It is our understanding that the City of Key West is seeking to retain a professional design firm to provide the City with a complete engineered design for the Tarpon Pier Replacement Project for City Marina.

C3TS has excelled at working with public agencies under these types of contracts. We believe that this success can be traced to a simple combination of factors. With a staff of over 140 people in Miami-Dade, Broward, Palm Beach, and Orange Counties, C3TS is one of the largest Engineering, Environmental Sciences, Architectural, Planning and Public Relations firms in South Florida. At the same time, C3TS has always placed the highest emphasis on personal commitment with our clients. In other words, C3TS combines the best of both worlds in delivering the advantages of working with a large firm while still providing the personal service that is characteristic of a smaller firm. In addition, over 95% of our work lies within the public sector, thereby emphasizing the type of work and level of service that we provide in order to perform on continuing service contracts.

Our experience derives from having worked throughout Florida, knowing the local construction markets, and the regulatory agencies that permit the projects. One of the main goals of our firm is to establish good working relationships within the communities that we service. In providing professional services to local communities, we offer our knowledge of the construction and regulatory environment, our commitment to providing excellent service to each project, and our experience with the local conditions.

With such relevant experience and expertise, and such a knowledgeable team, we are confident that we are the best team for this project. We appreciate this opportunity to express our sincere interest in being of service to the City of Key West, and we look forward to a rewarding relationship.

We will be happy to answer any and all questions to your satisfaction. Feel free to call on us at (800) 448-0227. Sincerely,

Corzo Castella Carballo Thompson Salman, P.A. (C3TS)

dent.

Principal in Charge





# INFORMATION PAGE

## INFORMATION PAGE



Project Name: RFQ #11-002

Design of Tarpon Pier Replacement for

City Marina at Garrison Bight

Name of Firm: Corzo Castella Carballo Thompson Salman, PA (C3TS)

Contact Person: Ramon Castella, PE, LEED AP – Vice President

901 Ponce de Leon Boulevard, Suite 900

Coral Gables, Florida 33134

tel. (305) 445-900 fax (305) 445-3366

rcastella@c3ts.com

Project Manager: Thomas A. Charette





# ORGANIZATION CHART





## City of Key West



Terrance Glunt, PE (C3TS) *Principal in Charge* 



Thomas A. Charette (C3TS) *Project Manager* 

#### **SUPPORT SERVICES**

#### **DESIGN SERVICES**

#### SUBCONSULTANTS

# ENVIRONMENTAL SCIENCES / PERMITTING

Jeffry Marcus, PhD (C3TS) Senior Environmental Scientist

Philip Frank, PhD (TME) Senior Environmental Scientist

# MARINE ENGINEERING DESIGN

Ramon Castella, PE, LEED AP (C3TS) Senior Marine Engineer

Jeffrey S. Crews, PE, LEED AP (C3TS) Senior Structural Engineer

Heather Anesta, EI, LEED AP (C3TS) Structural Designer

#### REECE & WHITE LAND SURVEYING, INC.

SURVEYING SERVICES

Joe Robert White, PSM (RWS) Surveyor and Mapper

# BIDDING / CONSTRUCTION ADMINISTRATION

Thomas A. Charette (C3TS) Construction Manager

Danilo Caicedo, El (C3TS) Construction Inspector

# MECHANICAL / ELECTRICAL / PLUMBING ENGINEERING

Hector Seiglie, PE, LEED AP (C3TS) Senior MEP Engineer

Gloria Garcia, PE, LEED AP (C3TS)

Senior Mechanical Engineer

Manuel Carbonell, PE, LEED AP (C3TS) Senior Electrical Engineer



GEOTECHNICAL SERVICES

Paul Passe, PE, CPM (PSI) Chief Geotechnical Engineer

Dhuruva (Drew) Badri, PE (PSI)

Project Geotechnical Engineer

#### PROJECT TEAM

C3TS - Corzo Castella Carballo Thompson Salman, PA

TME – TerraMar Environmental Services, Inc.

RWS – Reece & White Land Surveying, Inc.

PSI – Professional Service Industries, Inc.

#### LOCATION

Key West & Coral Gables, FL Sugarloaf Key, FL Big Pine Key, FL Miami, FL





# **COMPANY INFORMATION**

## **COMPANY INFORMATION**

#### C3TS

C3TS is a locally-based Subchapter S Corporation founded in March 1988 in Miami, Florida. It is a full-service, multi-disciplined Architectural, Engineering, Environmental Sciences, Public Relations, and Urban Planning firm with offices in Coral Gables (Main Office), Fort Lauderdale, Boca Raton, and Orlando, Florida. We have been providing our services to public and private sector clients for over 23 successful years. The firm has grown from a group of 3 friends to a staff of over 140 employees in 4 offices statewide.

Ocala Orlando

Tampa Orlando

Port St.
Lucie

Gulf of
Mexico

Four Florida Locations

C3TS firm was created out of the desire to better serve our clients and derive the professional satisfaction from being able to more effectively control all aspects of a

project. Whether the project is a building, road or bridge, all of the divisions work together to make the final project the best it can be. With in-house teams including civil, environmental sciences, architecture, roadway, structural, traffic & transportation design, planning, MEP, grants, and public involvement, in addition to construction engineering inspections, C3TS caters to large institutional and governmental clients who need the integrated, innovative solutions C3TS provides. With over 120 combined years of experience among the principals, our clients have come to value our unique combination of integrated disciplines and commitment to excellence. The firm's staff has extensive experience in the planning, design and implementation of large-scale projects throughout Florida and the Southeastern United States.

C3TS' experience includes projects and services as diverse as coastal and marine facilities, award-winning highway and bridge design, park and recreation facilities, streetscapes, office buildings, emergency/fire station buildings, educational campus design and school facilities drainage, citywide planning, acquisition of grant funds, historic preservation, and other types of public buildings and facilities. Although working primarily in the Southeastern United States, the firm's experience is not limited to the US market.

C3TS' success is based on both the hands-on approach taken by the principals and associates together with the integration of its disciplines in the delivery of successful solutions. In addition, all projects are subjected to a rigorous in-house Quality Assurance / Quality Control Program which spans the life of the project. It is this constant attention to client and project needs which has resulted in C3TS' proven track record of consistent on-time and within-budget project delivery.

Our corporate philosophy is to maintain professional and attentive relationships with our clients, focusing equally on their needs as on their project's solutions. C3TS is committed to excellence in providing professional design services resulting in complete solutions for our clients. This results in over 90% of our workload coming from existing and past clients. The firm's computer capabilities include a wide array of CADD systems (MicroStation and AutoCAD), design software, and modeling packages (Geopak and Road Calc). These systems, in the hands of our experienced architects and engineers, assist us in producing high quality designs and construction documents quickly and efficiently.

C3TS is committed to excellence in providing professional design services resulting in complete solutions for our clients no matter what the project.











## **COMPANY INFORMATION**



#### Terramar Environmental Services, Inc.

Terramar Environmental Services, Inc. is an environmental consulting firm located in the Lower Florida Keys and has been operating full time since 2004. The firm specializes in marine and terrestrial environmental assessments and environmental resource permitting in the Florida Keys. The firm is owned by Philip A. Frank. Ph.D. and Rowena P. Garcia. Dr. Frank has over 25 years of experience conducting environmental regulatory work throughout Florida and the Florida Keys, working as a private consulting biologist and also as a regulatory biologist with the U.S. Fish and Wildlife Service and Florida Fish and Wildlife Conservation Commission. Ms. Garcia has over 17 years of regulatory experience in the Florida Keys, working for the Department of Environmental Protection, Department of Community Affairs, the FWC, and the Nature Conservancy. Terramar Environmental Services, inc. has recently completed several projects in within the City of Key West including a biological inventory use in permitting repairs to Mallory Square Pier, permitting the replacement of the Marlin Pier in Garrison Bight, permitting coral relocation for the White Street Pier, and completing a benthis resource assessment for repairs to the Outer Mole Pier.

#### Reece & White Land Surveying, Inc.

Reece & White Land Surveying, Inc., formerly R.E. Reece, P.A., is a professional surveying and mapping firm providing a wide range of surveying services including construction stake-out, boundary and section work, topographic and hydrographic surveying and GPS. Our varied client base includes contractors, engineers, architects, attorneys, realtors and private individuals. Our firm located in Big Pine Key, Florida has been surveying in the Florida Keys for more than 15 years. We are members in good standing of the Florida Surveying and Mapping Society.

#### Professional Service Industries, Inc.

Professional Service Industries, Inc. is a nationally recognized consulting engineering and testing firm providing integrated services in several disciplines, including geotechnical engineering, construction services, materials engineering & testing, roof & pavement consulting, asbestos management, and facilities consulting and engineering. With approximately 2,500 professional engineers, materials testing inspectors, field and laboratory technicians and support personnel in 125 offices across the country, we are a leader among the nation's independent testing organizations and rank among the country's largest consulting engineering firms. PSI was incorporated in Delaware in June 26, 1972, with corporate headquarters located in Oakbrook Terrace, Illinois. Established in Florida in 1975 and licensed to provide Engineering Services, we have a team of more than 300 professionals located within 13 offices throughout the state. Our service area encompasses nearly every city and county in Florida, as well as 38 additional states in the U.S.

PSI's capability and capacity to timely complete the work is evidenced by our response time methodology, our experience and resources, as well as the successful completion of numerous similar projects. The nature of PSI's consulting business is the performance of many tasks of relatively short duration for multiple clients. Even our long-term contracts are of the indefinite quantity type, and thus, actual workload is dependent upon the release of individual task authorizations. As a result, no individual staff member is totally dedicated to a single project for long periods of time and we will always have ample field and laboratory capabilities to rapidly and effectively respond to our clients. This operating environment promotes the discipline required to be flexible and sensitive to changing client needs.





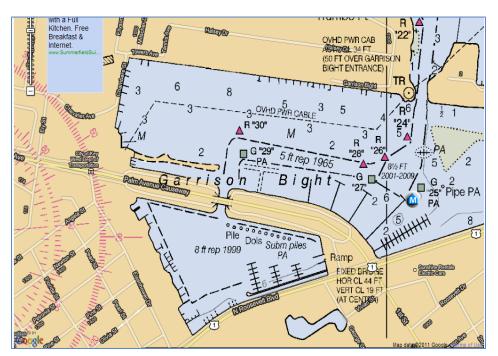


The engineering design & permitting for the demolition of the existing fixed-pier system and its replacement with a floating pier system is a fairly straight-forward technical endeavor. Of primary importance in this process will be the environmental permitting effort. The C3TS team brings to the City of Key West very strong relevant experience in this area. Our environmental sciences department, together with TerraMar, is currently working for the Florida Department of Transportation District 6 Office in the improvements to Houseboat Row Seagrass Restoration Project along South Roosevelt Boulevard. TerraMar also accomplished the environmental permitting in 2006 for the demolition and replacement for the adjacent City of Key West Marlin Pier.

As for the Marlin Pier, it is anticipated that environmental permitting for the Tarpon Pier will involve only minimal impact to marine resources, possibly limited seagrass and small coral impacts. Our team has extensive experience addressing these types of impacts and negotiating mitigation agreement with the regulatory agencies. We are confident that we can obtain an ERP permit for the replacement of the Tarpon Pier in the shortest time possible. Within 30 days of completion of final engineering plans, we can have the ERP application including benthic resource assessment completed and ready for City review and submittal to the FDEP and UASCE. Environmental deliverables will include the ERP application, a benthic resource assessment, and a mitigation plan and coral relocation plan (if required).

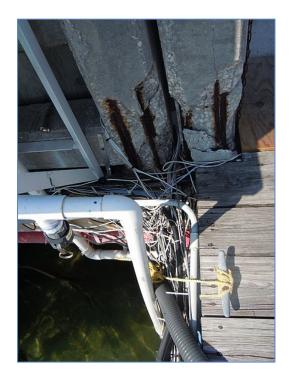
The marine/structural design of the floating pier system will be performed in coordination with the manufacturer. Our primary design elements will include the overall geometrical layout of the pier, slips and piling, and the wind/wave study to determine the height and other characteristics of hurricane-driven waves which will produce the forces to which the pier and its structural piling will need to be designed to resist. C3TS has designed multiple floating docks throughout south Florida, including piers with concrete floating dock units and with polyfloat/aluminum frame units (GatorDock system).

The Tarpon Pier replacement project, as proposed by the City of Key West, will pose a few additional design challenges. Primary among these will be the project requirement to develop construction options in order to accommodate access to houseboats during construction. The Garrison Bight Marina has some capacity to temporarily relocate vessels from the Tarpon Pier, but not enough to accommodate all of the 40+ vessels, and some of the larger vessels currently at Tarpon Pier cannot be relocated to the inside of the marina due to the 19 ft vertical clearance limit under the Palm Avenue Causeway bridge. This will necessitate careful phasing of the demolition and reconstruction. The City of Key West and the Marina residents and other stake-holders will need to be brought into this planning effort to assure a shared expectation of the project, well in advance of any construction or demolition activities.



Another key issue in this pier replacement project will the reconstruction of the many pier-attached utilities: water, protection, sanitary sewer, electrical and communication. One of the first steps to be taken is to conduct a thorough evaluation of these various systems, including their current service connection points, and the condition of any parts of the systems which the City of Key West has identified as wanting to reuse as part of the new pier- such as the vacuum sewer station and the Marina Power pedestals.

Some of the new utility service connections will require work on the landside of the marina facility, necessitating some possible pavement and sidewalk reconstruction. This being the case, a proper evaluation of the landside area in the pier-head vicinity should to done to determine what other marina elements, such as concrete guardrails, lighting, landscaping or ADA accessibility issues are in need of improvement. Some of these elements were noted in the 2004 CH2M Hill Evaluation Survey as being in need of repair. The City can decide if these elements will be addressed as part of this project, and if they are to be included in the project whether they are to be part of the base project bid, or perhaps an additive bid alternate.





C3TS' planning, programming and design process is structured with particular attention to cost & time management and budget control to guarantee the budget and time allocation for each project.

#### Cost Control

Cost estimating remains a critical part of our design process and cost control methodology. C3TS will develop all costs within the defined goals using constructability analysis, value engineering, budget constraints, and scheduling to achieve those goals. Cost control will be achieved by adopting a predictive cost planning approach. Generally, we produce these cost estimates during the course of the design. During all phases of the project, C3TS will review the construction cost estimates and refine the design to maintain the project on-budget and on-time.

C3TS has extensive experience in helping municipalities achieve positive bottom line results by improving existing processes, identifying new ones, and pinpointing areas for cost savings. We have the management perspective and specialized knowledge needed in order to deliver major cost reductions with improved efficiencies to our clients. Our effective management team reviews the anticipated costs, researches alternative savings methods on a continual basis and monitors progress and quality to reduce your costs.



#### Schedule Control

We understand how critical schedules are. Maintaining a project on schedule begins with understanding the key issues that drive it, and developing contingency plans to control it. The primary purpose of the project schedule is to provide a full accounting of all relevant activities and phases as well as the proper sequencing of project related events such that the project is delivered on schedule. We feel confident we can meet the City's project schedules because of our varied background of this kind. Following are some of the ways we propose to control the project schedule:

- Coordination with Subconsultants (long-standing relationships enable us to understand their process)
- Accelerate non-critical path activities to compensate for unforeseen delays later on
- Meet with FDEP's staff, public officials, and key community members ahead of time for consensus on key project issues
- Pro-active Project Management Plan (PMP)
- Clear understanding of Scope of Services ensures schedule is created correctly from the beginning
- · Allow for proper QA/QC time

#### **Quality Control**

At C3TS, we use the most current technology, which allows for optimum and accurate design. We use an in-house peer review Quality Control / Quality Assurance (QA/QC) program to complete our assignments within schedule, at budgeted cost, and with high quality and reliability. All work is executed in conformance with applicable codes and standards. The work of any subconsultants we use is subjected to the same review as our C3TS generated work.

We at C3TS are proud to be able to say that our firm-wide errors and omissions resulting in claims is less than ½ of 1% of construction budgets. This is due to the following:

- Principal Involvement during all Stages of Design and Construction
- Established QA-QC Program
- Independent Peer Review Prior to Major Deliverables

We believe that the C3TS TEAM has the experience and knowledge in planning and designing public and private projects that no other firm can match. We are confident that we can successfully fulfill and execute the requirements of this contract and provide the City of Key West with an outstanding project.





# PERSONNEL



#### C3TS

#### TERRANCE GLUNT, PE - Principal in Charge

EDUCATION: Bachelor of Science in Civil Engineering Florida International University, 1985

Bachelor of Science in Environmental Sciences, Juniata College, Huntington, Pennsylvania, 1976

PROFESSIONAL REGISTRATION: Florida Professional Engineer License No.: 40130; Threshold Inspector License No.: 0950; Dispute Review Board Member; ACI Level I Field Technician; OSHA 40-hour Hazardous Materials Technician (HAZMAT); Troxler Nuclear Density Gauge

Mr. Glunt has over 34 years of experience in the management and administration of engineering divisions responsible for all aspects of design and construction of government and agency related facilities including marina and boating access facilities, recreation complexes, urban and Interstate roadways and bridges, utility corridors, municipal public works and administration facilities, nuclear power plants, landfills and aviation facilities throughout Florida and the United States. His specific experience includes engineering design and coordination of multiple projects, construction engineering and inspection, quality control / constructability review, rigid and flexible pavement design and analysis, geotechnical and environmental studies, DRI and PD&E involvement, environmental and drainage permitting, preparation of grant applications and coordination of numerous miscellaneous civil and structural contracts with State, County and Municipal entities. Mr. Glunt has been responsible for the start-up of numerous offices for his current firm, as well as for his previous employers; involving research and development, establishment of budgets and procurement of all facilities, equipment, vehicles and staff. He has been a Resident Engineer on FDOT construction projects in numerous Districts and the Engineering Manager and Director of both Geotechnical and Construction Divisions for a medium-sized engineering firm, and is experienced in project management, office staff and field crew supervision, technical design, analysis and report writing, bid preparation, specification writing, claims analysis, scheduling, shop drawing review, "as-built" plan preparation, contractor pay estimates, and on-site laboratory and field testing operations. Some specific experience in various fields includes the following: Waterway Park, Palm Beach County, FL; Ft. Pierce Inlet Boat Ramp Facilities (Phases I & II), Fort Pierce, FL; Deerfield Island Boardwalk and Docks, Deerfield Beach, FL; North Causeway Boat Ramps, St. Lucie County, FL; Atrium Marina, Aventura, FL; Burt Reynolds Boat Ramps, Palm Beach, FL

#### THOMAS A. CHARETTE – Project Manager

EDUCATION: Florida International University, Miami, FL; B.S. in Civil Engineering, 1986; Florida International University, Miami, FL; M.A. Childhood Education, 1977; Huntington College, Montgomery, AL; B.S. Math and Art Majors, 1968

Mr. Charette has 20 years of experience providing civil engineering concepts and practices related to planning, layout, design, and construction of facilities. He was employed by the Department of Defense as the Civil Engineer for the Public Works Department of Naval Air Station in Key West, Florida. His primary duties as a lead engineer were related to all phases of the development, design and construction of large civil and structural projects. For these projects his tasks included generating scopes and cost estimates based on inspection of buildings, infrastructure, grounds and/or facilities, evaluating A&E firms, awarding design contracts to A&E firms, working on site with A&E firm's staff, evaluating all phases of design documents, assisting with the award of the construction contract and providing engineering support during construction. Mr. Charette tasks for smaller projects were to create complete construction documents ready for award, assist with the award of the construction contract and provide engineering support during construction. Duties also included providing engineering support for projects being developed by other lead engineers or architects and to assist the maintenance department of Naval Air Station Key West when engineering was required. Mr. Charette also has extensive experience with the design and quality assurance of major roadway projects. Some of his relevant work experience includes: Marine Max Facility at Ocean Reef Club, Key Largo, FL; Naval Air Station Experience including Major projects - Work with Architect-Engineering firms to develop construction documents, requests for proposals and studies; Projects related to numerous Airfield Pavement Issues (arresting gear protective plate out of alignment, broken concrete repair, etc.); Airfield Vegetation Alterations (changed mangrove area into rabbit habitat); Alterations to Waste Water treatment Plant (construct injection Wells); Coordinate Pull Test at High Power Check Pad (non engineering assignment).

## **PERSONNEL**



#### C3TS

#### JEFFRY MARCUS, PH D - Senior Environmental Scientist

EDUCATION: Ph.D., Aquatic Biology, University of Lancaster, England, 1978; Bachelor of Arts in Biological Sciences, University of Colorado, 1975

PROFESSIONAL REGISTRATION & CERTIFICATIONS: President of the South Florida Association of Environmental Professionals; Associate Member of the U.S. Association for the Club of Rome; The Explorers Club – South Florida Chapter; America's Registry of Outstanding Professionals; Strathmore's Who's Who; The Contemporary Who's Who (American Biographical Institute); Leading Educators of the World (International Biographical Institute)

Dr. Marcus has over 34 years of experience in environmental assessment and regulatory compliance. He has an extensive background in transportation related impact analysis as required by NEPA (Programmatic, Cat-EX Type II, EA/Fonsi and EIS's) and FHWA regulations as well as State Environmental Impact Reports (SEIR) for non-federally funded facilities. His areas of expertise include freshwater and marine ecology, wetlands restoration and enhancement programs, and the preparation of environmental assessments and impact statements; particularly in subtropical and tropical habitats. Dr. Marcus has conducted numerous biological surveys, air and noise investigations, endangered species impact assessments, wetlands delineations, ecological risk assessments, and has prepared a wide variety of permit applications at the Federal, State and local levels. Prior to joining C3TS, Dr. Marcus worked for CES, Inc. for 16 years managing all environmental contracts. Prior to 1994, Dr. Marcus worked as the Director of Environmental Compliance for Science Applications International Corporation (SAIC), was Environmental Administrator for District 6, Florida Department of Transportation (Miami-Dade and Monroe Counties), worked in Coastal permitting at the Miami-Dade County Department of Environmental Resources Management (DERM) and was a research scientist at Florida International University (FIU). Dr. Marcus is also an adjunct professor at the University of Miami College of Engineering. Some of his experience includes: Project Manager of the Districtwide Environmental Data & Report Contract in FDOT District 6 from 1990 to 2010; Houseboat Row, Key West, FL; Card Sound Road Intersection Environmental Assessment, FDOT District 6, Monroe County, FL; Old Seven Mile Bridge Superstructure Replacement, FDOT District 6, Monroe County, FL; US 1 2-Lane Safety Project, FDOT District 6, Miami-Dade and Monroe Counties, FL; Districtwide Mitigation & Maintenance Services Contract, FDOT District 6; I-395 Environmental Impact Statement, FDOT District 6, Miami-Dade County, FL

#### DANILO CAICEDO, EI - Construction Inspector

EDUCATION: Bachelor of Science in Engineering, Florida International University, 1990

REGISTRATIONS: Engineer Intern 1100009198

Mr. Caicedo has over 18 years of experience in all phases of construction and inspections. During this time he has built multimillion dollar projects from initial to final phase, commercial developments to custom single family housing, has carried out daily on-site inspections and supervision, maintaining excellent communication skills and safety standards. He has acquired building permits and supervised project construction as well as review of plans and specifications. Some of his experience includes: Marine Max Facility at Ocean Reef Club, Key Largo, FL; Crandon Park Marina, Key Biscayne, FL; Highland Village Neighborhood Improvements, North Miami, FL; Plantation Midtown Improvements and Greenway Transit Route Phase I, Plantation, FL; Norwood Oeffler Water Treatment Plant & Operations Center, North Miami Beach, FL;



#### C3TS

#### RAMON CASTELLA, PE, LEED AP - Senior Marine Engineer

EDUCATION: Bachelor of Science in Civil Engineering, Florida International University, 1985

PROFESSIONAL REGISTRATION: Florida Professional Engineer License No. 40073; Puerto Rico Professional Engineer License No. 11731; LEED Accredited Professional

Mr. Castella has over 25 years of expertise in Civil Engineering Projects throughout Florida and in the Caribbean. Mr. Castella's Land Development experience includes such projects as Embassy Lakes subdivision, which consisted of a 640-acre residential community and land planning for over 3,000 acres in South and Central Florida. He also has extensive experience with Municipal engineering projects, including the programming, planning, and preparation of construction documents as well as construction administration. Projects range from the development of park facilities and expansion of Municipal buildings to sizable public works projects. His public works projects include drainage, flood control, coastal construction, water and sewer expansions, road and bridge construction, municipal land planning and grant acquisition. Mr. Castella has extensive experience with the design and quality assurance of major roadway projects. Some of his relevant work experience includes: *Marine Max Facility at Ocean Reef Club, Key Largo, FL; Crandon Park Marina, Key Biscayne, FL; Matheson Hammock Marina, Coral Gables, FL; West Mashta Drive Bridge, Key Biscayne, FL; Fort Pierce Inlet Marina Boat Ramp Facilities, Fort Pierce, FL; Fisher Island Ferry Terminal, Fisher Island, FL; Town of Golden Beach Capital Improvements Program, Golden Beach, FL* 

#### JEFFREY S. CREWS, PE, LEED AP – Senior Structural Engineer

EDUCATION: Bachelor of Science in Civil Engineering, Cum Laude, University of Miami, 1988

PROFESSIONAL REGISTRATION: Florida Professional Engineer License No. 46575: Certified Masonry Inspector No. SMI 74; FICE / FDOT LRFD Seminar Training; LEED Accredited Professional

Mr. Crews, with over 23 years of experience, has been design and field engineer on various projects in the field of structural and civil engineering. Mr. Crews' civil experience has included the preparation of utility relocation plans, drainage analysis, development of traffic control, and stormwater pollution prevention plans on various FDOT projects throughout South Florida. Mr. Crews also has extensive design, construction inspection, and administration experience in all types of building structures. Mr. Crews' bridge experience includes both the designs of new structures as well as rehabilitation of existing structures. This experience has included cast-in-place, AASHTO girders, Repair and inspection of steel bridges, box culverts, and rehabilitation of Bascule bridges and tender house facilities. Mr. Crews has also inspected and rehabilitated historic bridges such as the bridges along the Venetian Causeway in Biscayne Bay. His experience includes: Marine Max Facility at Ocean Reef Club, Key Largo, FL; Crandon Park Marina, Key Biscayne, FL; Matheson Hammock Marina, Coral Gables, FL; West Mashta Drive Bridge, Key Biscayne, FL; Deerfield Island Park Boardwalk Park, Deerfield Beach, FL; SR 10A Bridge Replacement over Bayou Texar, Pensacola, FL; Basin "A" Stormwater Pump Station, Lauderhill, FL

#### HEATHER ANESTA, EI, LEED AP – Structural Designer

EDUCATION: Masters of Science in Structural Engineering, Florida Atlantic University (anticipated completion December 2010); Bachelor of Science in Civil Engineering, Florida State University, Tallahassee, 2007

Leadership in Energy and Environmental Design (LEED) Accredited Professional

Ms. Anesta has more that three years experience in the design and inspection of structural engineering projects. She has a strong understanding of engineering specifications and construction methods including advanced structural analysis, strength and mechanics of materials, concrete design, steel design, timber design, wind load analysis, and the shoring and re-shoring of concrete structures. Some of Ms. Anesta's specific experience includes: *Marine Max Facility at Ocean Reef Club, Key Largo, FL; Fisher Island Ferry Terminal, Fisher Island, FL; Green Turtle Hammock Park, Monroe County, FL; Canal Bulkhead Improvements, Broward County, FL; Belvedere Road and Pike Road Intersection Improvements, Palm Beach County, FL* 



#### C3TS

#### HECTOR SEIGLIE, PE, LEED AP - Senior MEP Engineer

EDUCATION: Bachelor of Science in Mechanical Engineering, Auburn University, 1957

PROFESSIONAL REGISTRATION: Florida Professional Engineer License No. 10799 (July 1964); Arkansas Professional Engineer License No.: 10799 (June 1976); Georgia Professional Engineer License No.: 11053 (August 1977); North Carolina Professional Engineer License No.:32446 (November 2006); LEED Accredited Professional

Mr. Seiglie is a senior mechanical engineer conversant with local, state and national regulations. He has over 50 years of experience which encompasses projects in utility system planning and extensions, commercial, institutional, industrial and multifamily residential buildings. Mr. Seiglie has worked on a wide variety of high-profile projects throughout south Florida, including "One Biscayne Tower", a \$35,000,000 forty-story office building; "2600 Douglas Center", a \$12,000,000 twelve-story office building; and the "Coral Gables Police and Fire Station", a \$6,000,000 three-level police-fire station, court building, and parking garage. Additionally, while employed with Florida International University, he worked as Facilities Planning Engineer, and his duties included setting engineering standards, utilities planning, performing peer review on capital projects and managing all types of capital projects from programming through completion of construction. Methods of delivery for these projects were conventional design-bid-construct, design build, as well as Construction Manager at risk. The unusual and broad spectrum of experience and exposure that Mr. Seiglie possesses enables him to approach all aspects of engineering and management problems with a keen perception of the overall project needs. Some of his past experience includes: Marine Science and Testing Facility at Florida International University, Bay Vista Campus, North Miami Beach, FL; Okeechobee Waste Management Building, Okeechobee, FL; Integration of Small Engine Division & Large Engine Division Plants, Doral, FL; Claude Pepper Park Youth Center, North Miami, FL; FIU C&P Laboratories Biology/Oceanography Teaching Lab, University Park Campus, FL

#### GLORIA GARCIA, PE, LEED AP - Senior Mechanical Engineer

EDUCATION: Bachelor of Science in Mechanical Engineering, University of Havana, 1986

PROFESSIONAL REGISTRATION: Registered Professional Engineer in Florida No.: 6560; LEED Accredited Professional Ms. Garcia is a Mechanical Engineer with over 24 years of experience. She is extremely knowledgeable in implementing the building system as a tool for design and construction administration. Some of her past experience includes: Water Distribution System Master Plan in Highland Village, North Miami Beach, FL; City of Opa-Locka Sanitary Sewer Evaluation and Survey, Opa-Locka, FL; Camana Bay Development, Grand Cayman, BWI; FIU Bay Vista Campus Marine Science Building Modification, Biscayne Bay Campus, North Miami Beach, FL; Claude Pepper Park Youth Center, North Miami, FL

#### MANUEL CARBONELL, PE, LEED AP - Senior Electrical Engineer

EDUCATION: Bachelor of Science in Electrical Engineering, Universidad Central de Las Villas, Cuba, 1996
PROFESSIONAL REGISTRATION: Florida Professional Engineering License No. 65584; Leadership in Energy and Environmental Design (LEED) Accredited Professional

Mr. Carbonell has over 14 years of experience in electrical engineering and has been Engineer of Record, Project Manager or Project Engineer on variety of projects including all elements such as lighting, power, fire alarm, security, and special systems. He has extensive experience with project management, design planning, review, and client/vendor coordination. Mr. Carbonell has been responsible for the development of construction drawings for the following, lighting, closed circuit television (CCTV), paging, fiber optic distribution, intercom systems & fire alarm systems. He has been instrumental in developing and implementing special systems for airports, transportation (Illumination and tolling) schools, municipal and commercial buildings throughout south Florida. He has developed various illumination projects and is proficient in Aladan Plus and AGI-32 software. Following is a list of some of his relevant experience: *Marine Max Facility at Ocean Reef Club, Key Largo, FL; Shared Use Path for Pedestrians and Bicyclists (M-Path) along SR 5 (US-1) from Datran Drive to SW 67th Avenue Design-Build (DB), Miami-Dade County, FDOT District 6; John F. Causeway Redevelopment, North Bay Village, FL; Murray Park Aquatic Center, South Miami, FL; Security Improvements at Miami International Airport, Miami, FL* 

## **PERSONNEL**



#### TerraMar Environmental Services, Inc.

#### PHILIP A. FRANK, PH D - Senior Environmental Scientist

EDUCATION: Ph D University of Florida, Wildlife Ecology and Conservation; MS University of Florida, Zoology; BS Indiana University, Biology

Dr. Frank has over 25 years of experience in environmental conservation with agencies at both the State and Federal Level. He spent over 13 years with the USFWS and FWC in the Florida Keys. Dr. Frank was a Project Manager with the FWS and FWC for numerous threatened and endangered species conservation and recovery projects in the Florida Keys. He has a unique and respected ability to relocate corals off of bridges (i.e. Bahia Honda Bridge) and has established an excellent relationship with the Florida Keys National Marine Sanctuary. He has overseen the design and construction of numerous mitigation projects in the Keys for FDOT. His experience with listed species in the Florida Keys includes the Key Largo wood rat, Key Largo cotton mouse, Key deer, Lower Keys marsh rabbit and silver rice rat. Some of his past experience includes: *Marlin Pier Replacement* at Garrison Bight Marina; 2009-2010 - Dr. Frank was responsible for the development of the House Boat Row seagrass mitigation project in association with North Roosevelt Boulevard (for D6, John Palenchar); 2008-2009 – Dr. Frank was responsible for coral relocation relating to bridge repairs for the FDOT D6. Dr. Frank coordinated with the Florida Keys National Marine Sanctuary and successfully relocated corals off of Bahia Honda and other FDOT bridges (for D6, John Palenchar); 2007-2009 – Conducted Key Largo Woodrat and Key Largo Cotton Mouse trapping for the Card Sound Intersection Project and for the Port Bougainville restoration work associated with sediment re-use from the removal of the Lake Surprise Causeway (for D6, John Palenchar); 2008-2010 – Dr. Frank oversaw compliance activities on all active construction projects in Monroe County including Grassy Key, Bahia Honda Bridge, Channel Two Bridge, Emergency Hurricane Repairs, Boca Chica sea-grass tidal exchange channel, and various boat ramps (for D6, John Palenchar).

#### Reece & White Land Surveying, Inc.

#### JOE ROBERT WHITE, PSM - Surveyor and Mapper

EDUCATION: Troy State University, Bachelor Degree in Criminal Justice/Geography; Continuing Education Courses: Mean High Water Surveying Field Practices 6 Credit Hours—Legal Descriptions 6 Credit Hours—Florida Minimum Technical Standards PROFESSIONAL REGISTRATIONS:Professional Surveyor and Mapper — Florida #LS6688; U.S. Merchant Marine Officer — USCG Charter Boat Captain

Over twenty-seven years of experience in all aspects of surveying including construction stake-out, boundary, sectional breakdown, topographic and hydrographic surveys.

Some of his past experience includes: *Marlin Pier Replacement at Garrison Bight Marina, Key West, FL-Elevation of bulkhead in relation to mean high and mean low water, Bathymetry in area of proposed pile locations and along existing dock, Top of existing pile elevations, Set baseline for construction, Stake-out for new pile alignment; Howell Key Development: Mean high water and hydrographic survey with detailed mapping of the existing basin and the dredged access channel. Within the basin and dredged channel, data points were obtained at sediment surface and to refusal to estimate extent of dredging; Sunset Harbor Trailer Park: Hydrographic survey of the north basin area. Elevations taken at top of substrate (silt) on a 10-15 foot grid. Elevation data referenced to Mean Low Water; Fleming Residence: Survey vacant waterfront residential lot, defining riparian lines, Mean Low Water and MLWL contours for dock design.* 

## **PERSONNEL**



#### Professional Service Industries, Inc.

#### PAUL PASSE, PE, CPM - Chief Geotechnical Engineer

EDUCATION: Bachelor of Science, Civil Engineering, University of Wisconsin - Platteville, 1978

PROFESSIONAL REGISTRATIONS: Registered Professional Engineer, #34750, Florida, 1984; Registered Professional Engineer, #15265, Alabama, 1984; Registered Professional Engineer, #16667, Minnesota, 1982; Registered Professional Engineer, #21569, Wisconsin, 1982; Certified Public Manager

Mr. Passe has over 30 years experience in the field of geotechnical engineering and materials testing, 13 of which were spent working directly with the Florida Department of Transportation. He spent four of those years as District Geotechnical Engineer, responsible for assignment of project managers for design and construction, and the other eight as the State Geotechnical Engineer, acting as Senior Review and troubleshooter for projects state wide as well as provided guidance and leadership for geotechnical policy and procedures for the FDOT. He has participated in over 100 various geotechnical and construction projects regarding, roads, bridges, buildings and sinkholes all over the State of Florida. He has also done numerous presentations for the FDOT at conferences and seminars, and helped develop geotechnical-related specifications and training courses. He serves on the Geotechnical Institute, Transportation Research Board and National Cooperative Highway Research Program task forces, committees and panels. Some of his past experience includes: *Pier House Resort & Spa, Key West, FL; S197 Structure Replacement, U.S. 1 in Proximity to Manatee Bay, Miami Dade County, FL; Key West International Airport, Key West, FL; Port of Miami Tunnel, Design Criteria Package, Miami Dade County, FL; SR 826/836 Interchange, Miami-Dade County, FL; W 18th Avenue (from W 60th Street to N. of W 64th Street), Hialeah, FL; SR 869 Deerfield Toll Plaza Modifications Design-Build, Broward County, FL* 

#### DHURUVA (DREW) BADRI, PE - Project Geotechnical Engineer

EDUCATION: MS in Geotechnical Engineering, University of Florida, 2003; BE in Civil Engineering, National Institute of Technology Karnataka, India, 2001

PROFESSIONAL REGISTRATIONS: Registered Professional Engineer, #68718, Florida, 2008; Registered Professional Engineer, #72686, Ohio, 2008

Mr. Badri has over eight years of geotechnical experience on various public and private sector projects. A vast variety of Mr. Badri's public sector projects have included work on roadways, bridges, canals, schools, healthcare facilities. Mr. Badri's public sector clients have included Florida Department of Transportation (FDOT) (District IV, VI and Turnpike), Port(s) (Miami and Port Everglades), South Florida Water Management District (SFWMD), School District(s) and engineering services for various Cities and Municipalities. Mr. Badri was extensively involved in the field and laboratory testing phase for both the Port of Miami Tunnel (Geotechnical Data Report) as well as the Florida Power & Light (FPL) transmission line across Biscayne Bay. Both these projects involved undertaking over-water field activities in highly environmentally sensitive regions and required substantial coordination with various permitting agencies. Mr. Badri is currently providing post-design services on the Port of Miami Tunnel project. He has also been involved in several projects involving problematic soil conditions, wherein ground improvement techniques were evaluated and resulted in substantial project savings. As part of his MS degree curriculum at the University of Florida, Mr. Badri performed extensive research on an FDOT managed project involving evaluation of axial capacity of large diameter cylindrical piles. Some of his past experience includes: *Pier House Resort & Spa, Key West, FL; S197 Structure Replacement, U.S. 1 in Proximity to Manatee Bay, Miami Dade County, FL; City of Key West Administration Building Complex – Angela Street Site, Intersection of Angela Street and Simonton Street, Key West, FL; SR 826/836 Interchange, Miami-Dade County, FL* 





# QUALIFICATIONS

## **QUALIFICATIONS**



C3TS is a full-service, multi-disciplined Architectural, Engineering, Environmental Sciences, Public Relations, and Urban Planning firm with offices in Coral Gables (Main Office), Fort Lauderdale, Boca Raton, and Orlando, Florida. We have been providing our services to public and private sector clients for over 23 successful years.

The Civil Engineering Department has distinguished itself while compiling a large and varied project portfolio since 1988. The department has completed many marine / coastal, streetscape, utilities, and water resources projects for many satisfied clients. Some of the group's most noteable marine / coastal projects include Crandon Park Marina and Matheson Hammock Marina Park for Miami-Dade County Parks & Recreation, Marine Max Facility at Ocean Reef Club in Key Largo, Florida, Waterway Park Palm Beach County, Florida; and the Fort Pierce Inlet Marina Boat Ramp Facilities in St. Lucie County. They have also completed several major projects, including the Crandon Boulevard Master Plan for the Village of Key Biscayne, the Plantation Midtown North Streetscape & Roadway Improvements for the City of Plantation, numerous roadway projects for the City of Hialeah and the Watermain Extensions for the City of South Miami. The Civil group has also completed various high profile projects such as the streetscape improvements on Ponce de Leon Boulevard (City of Coral Gables) and on Sunset Drive through South Miami's downtown district, as well as the I-75 Little Manatee River Southbound Rest Area for FDOT District 7, and the East Entrance Road at Florida International University. Additionally, C3TS' Civil Department has worked on a multitude of large recreation projects such as Grapeland Park, T.Y. Park – Castaway Island, C.B. Smith Park, and Jacob's Aquatic Center.

Constantly faced with unique environmental challenges and concerns on projects, the Civil / Environmental Engineering Department is highly skilled at providing effective, innovative engineering solutions. A distinctive example of this is seen in our project for the City of North Miami Beach at its Norwood Water Treatment Plant. It entailed the retrofit of an existing chlorine storage facility and the design of an emergency vapor scrubber to neutralize toxic fumes in the event of an accidental release of chlorine gas. Additional projects nearing completion include a variety of water supply, wastewater and stormwater projects for municipalities throughout South Florida.

C3TS' Division of Environmental Services provides a wide array of expertise in the areas of natural, physical, and socioeconomic impact analysis, documentation and mitigatory solutions. Our staff have well established reputations and are respected within the environmental regulatory community for the highest quality of work and responsiveness. Our capabilities are based on solid education, experience, and understanding of the need to balance development and the presentation of the environment. Our Environmental Services include: •Field Investigations, •Environmental Reports and •Regulatory Permits

The Architecture Department's staff works very closely with our various engineering departments, affording our clients a unique holistic approach to projects. Noteworthy among our most recent architectural successes are Grapeland Park (City of Miami), Coral Springs Public Safety Training and Technology Center (City of Coral Springs), master plan for the Pompano State Farmers' Market, the Lifelong Learning Center for Florida Atlantic University, and the PC Building Elevator Tower at Florida International University. As lead designers on Design/Build teams, we have worked on the North Dade Maintenance Facility (FDOT District 6), and Doral Middle School (Miami-Dade County Public Schools).

The Structural Engineering Department has done it all - from building to bridge structure design, and threshold building inspection to forensic investigation. Signature design projects include the West Mashta Drive Bridge in Key Biscayne, Pompano State Farmers' Market (Department of Management Services), the Helen Miller Community Center at Segal Park (City of Opalocka), and the Lifelong Learning Center (Florida Atlantic University). Other projects include the forensic investigation of several parking garages throughout South Florida, as well as threshold inspections on the Avborne Hangar at Miami International Airport

The Transportation Engineering Department has worked for the Florida Department of Transportation (Districts 1 through 7, Central Office, and Turnpike District), and county & municipal agencies on a wide range of highway and bridge projects statewide. Some signature projects include the \$120 million 95 Express Lanes (between SR-112 and SR-826) in Miami-Dade

## **QUALIFICATIONS**



County (FDOT District 6), the \$32 million SR-874 Northbound On-Ramp from Kendall Drive in Miami-Dade County (FDOT District 6), the \$37 million SR-500 project from SR-15 to Hibiscus Road (District 5), and the \$11 million I-95 project from NW 125th Street to Opa-locka Boulevard (FDOT District 6). The firm was also awarded the SR-46 highway improvement contract from District 5.

The Mechanical, Electrical, & Plumbing Department has extensive experience in designing MEP systems for new constructions and renovations, as well as upgrades to existing MEP systems. The combined professional engineering experience of our team covers a wide spectrum of specialized knowledge which includes schools, healthcare facilities, and a wide variety of governmental projects.

The Construction Management / Construction Engineering Inspections Department has worked on numerous Design/Build projects, as well as ongoing C.E.I. contracts for the Florida Department of Transportation, City of South Miami along with several other municipalities and governmental clients. Our inspectors completed the C.E.I. work on the Performing Arts Center Streetscape Improvements for the City of Miami and the Quail Roost Drive Superpave project for FDOT District 6. In addition, District 4 recently awarded C3TS a Districtwide C.E.I. Services contract, as well as the SR-834 / Sample Road C.E.I. contract.

The Public Involvement Department knows that people want to be involved in decisions that affect them. They understand that public involvement is about planning and implementing a comprehensive, integrated program to involve the public in the decision making process. C3TS encourages understanding and cooperation between each organization and the public; helps develop a communication system that meets each community's needs; helps the community understand every project, plan, and idea; allows all stakeholders – through participation – to have a say in government decisions; and develops an on-going system that meets the community's needs and desires.

The Grants Administration and Development Department has been able to help cities obtain over \$26 million in county, state, federal, and private grant funding so that their projects can, in effect, pay for themselves. They have successfully prepared grant proposals for projects ranging from the fairly uncomplicated, such as a one-time gift to repair the leaky roof of a senior citizens' center, to the expansive, such as multi-year funding for citywide street and drainage improvements. Further experience includes obtaining funding to build emergency shelters, repair stormwater and sanitary sewer improvements, acquire lands for the creation of public parks, build recreational facilities, and obtain landscaping and playground equipment.

#### Working Successfully on Similar Projects

The C3TS Team has worked on many successful projects together. The C3TS Environmental Sciences staff and TerraMar Environmental Services, Inc. have worked closely on many similar projects since 1994 and will be able to coordinate the engineering design and environmental permitting aspects of the Tarpon Pier project so that the project can be completed with maximum efficiency. Recent examples of environmental permitting of similar marine projects where C3TS and TerraMar staff have collaborated include the Key West Yacht Harbor on Stock Island (completed), the FDOT Key Haven Boat Ramp (under construction), and Key Haven Estates Marina (permitted).

Our surveyors, Reece & White Land Surveying, Inc. have also played an instrumental part of our success in the Keys by collaborating such projects as the Dove Creek Restoration in Key Largo and the Houseboat Row Seagrass Restoration Project in Key West. Reece & White Land Surveying, Inc. has also worked TerraMar Environmental Services, Inc. on the very similar Marlin Pier Restoration Project at Garrison Marina as well as the Howell Key Development.

The C3TS Team is committed to excellence in providing professional design services resulting in complete solutions for our clients no matter what the project!





# REPRESENTATIVE DESIGN PROJECTS & CLIENT REFERENCES

C3TS

#### **PROJECT NAME DESCRIPTION PROJECT IMAGES**

Waterway Park Palm Beach County,

Palm Beach County Parks & Recreation Dept. Ms. Karen Arndt

(561) 233-0208

C3TS was selected to provide planning, design and permitting services for this 15 acre park in NE Palm Beach County on the Intracoastal Waterway. The park facility included a boat ramp and parking for 60 vehicles with boat trailers, boardwalk and fishing docks, floating dock staging piers, seawall and erosion measures, a restroom building, environmental educational kiosks, roadway and utility infrastructure, and mitigation areas for mangrove, seagrasses and gopher tortoise habitat. The project had access issues with adjacent properties and required the design and permitting for a dedicated entrance via FDOT turn lane off of Indiantown Road. Legal requirements necessitated a re-plat of the properties as well as some land transactions between the client and the adjacent property owners. Environmental permitting included a full ERP permit through South Florida Water Management District, Florida Department of Environmental Protection and the Army Corps of Engineers, along with Coast Guard and FIND approvals. Other permits included site plan approval through Palm Beach County and the Town of Jupiter, ERM tree removal and relocation permits, utility permits for water and sewer and FDOT permit for the turn lane. Critical to the project was the coordination with the adjacent property owners HOA who had to approve the project prior to design because of joint access issues.

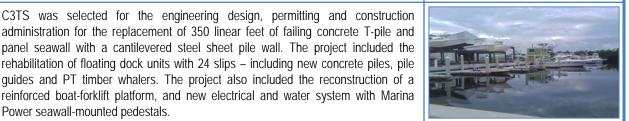




Marine Max Facility at Ocean Reef Club Key Largo, FL

Ocean Reef Club Mr. George Richards (305) 367-5919

administration for the replacement of 350 linear feet of failing concrete T-pile and panel seawall with a cantilevered steel sheet pile wall. The project included the rehabilitation of floating dock units with 24 slips – including new concrete piles, pile guides and PT timber whalers. The project also included the reconstruction of a reinforced boat-forklift platform, and new electrical and water system with Marina Power seawall-mounted pedestals. C3TS served as the Design Build Criteria Consultant for Miami-Dade County for the



Crandon Park Marina Key Biscayne, FL Miami-Dade County Park & Recreation Dept. Mr. Vincent Flick

(786) 552-8883

reconstruction of the Marina Facilities at the Crandon Park Marina. Design services included the full design of all civil components and the design build criteria for the foundation design of four floating piers subject to storm surge and hurricane force winds. As part of the design C3TS prepared a Wind/Wave Study in accordance with the USACOE Shore Protection Manual and developed criteria for piling system and scour countermeasures to resist the hurricane induced wave forces on the floating piers.



Matheson Hammock Marina Coral Gables, FL Miami-Dade County Park & Recreation Dept. Mr. Vincent Flick

C3TS served as the Design Build Specialty Engineer for the reconstruction of the Marina Facilities at Matheson Hammock. Design services included the design of all civil components and the foundation design of six floating piers subject to storm surge and hurricane force winds. As part of the design C3TS prepared a Wind/Wave Study in accordance with the USACOE Shore Protection Manual and designed the piling system and scour countermeasures to resist the hurricane induced wave forces on the floating piers.



Fort Pierce Inlet Marina Boat Ramp **Facilities** Fort Pierce, FL St. Lucie County Mr. Don McLam (772) 462-1514

(786) 552-8883

C3TS was selected for this recreational boat ramp facility featuring 4 boat ramps, floating dock finger piers, 2 staging areas, concrete seawall and cap, rip-rap revetments, parking for 75 vehicles with trailers, passenger car parking, drainage and wetlands areas, water, sewer and electrical service, lighting, information kiosks and turn lane access from State Highway with entrance feature.



Caporella Park Fishing Dock Tamarac, FL RDC, Inc. Mr. Joseph Cerrone

(954) 566-3885

C3TS' architectural and engineering design staff has extensive and in-depth experience in working with parks and recreational facilities projects throughout South Florida. C3TS was commissioned to provide design services, as well as construction management services, for this park facility, which included an ADA accessible floating aluminum fishing dock.





C3TS

Mr. John Palenchar

305-470-5223

C313		
PROJECT NAME	DESCRIPTION	PROJECT IMAGES
Atrium Marina Aventura, FL GM Atrium, LLC Mr. Steve McMahon (305) 933-0782	C3TS was selected for this residential marina featuring 22 high end live-aboard boat slips for condominium complex. Marina included concrete seawall and cap, timber dock and pier construction, mooring piles, water, electrical, communication and fire line services. ADA accessibility was provided.	
Synder Fishing Dock Ft. Lauderdale, FL Recreational Design & Construction, Inc. Mr. Joseph Cerrone (954) 566-3885	C3TS' architectural and engineering design staff has extensive and in-depth experience in working with parks and recreational facilities projects throughout South Florida. Some of this experience includes facilities such as the Snyder Park Fishing Dock for the City of Ft. Lauderdale. C3TS was commissioned to provide design services, as well as construction management services, for this park facility, which included an ADA accessible floating aluminum fishing dock.	n 2 Company
North Causeway Boat Ramps St. Lucie County, FL St. Lucie County Mr. Don McLam (772) 462-1514	C3TS was selected for this rehabilitation of existing public boat ramp and coastal park facility. The project included reconstruction of two ramps using 65 foot precast units and associated wood finger piers and staging docks. Project also included asphalt rehabilitation in ramp approach areas and construction of new elevated wooden docks through mangrove area to connect to boat dock staging area. Permits included FDEP, ACOE and SFWMD.	
Fisher Island Ferry Terminal Fisher Island, FL Fisher Island Community Association Mr. Jim Politis (305) 535-6043	C3TS was selected for this repair and rehabilitation project of a 30-year old over water platform in Government Cut, Miami Beach. 19 of the existing structure's 65 floor slab units were replaced and extensive repairs of the substructure piling, beams, and bulkheads were made. The project construction was accomplished in four separate phases so that the ferry terminal platform could remain fully operational and in service during the 60 day construction period. Permitting included FDEP, Miami-Dade County DERM, ACOE, and the Miami Beach Building Department.	
Turkey Lake Fishing Dock Orange County, FL Orange County Parks and Recreation Dept. / Sunbelt Construction Mr. Mark Stalsitz (813) 989-8009t	C3TS was the prime designer for this design build project on Turkey Lake in Orlando, Florida. The dock was a 300 plus foot fixed pier facility designed and permitted through FDEP for use as a recreation and staging dock for the adjacent boat ramp complex. The original dock was damaged heavily by hurricanes and the scope included complete removal of the existing dock and piles with installation of all new components capable of meeting the new Florida Building Code wind loading requirements. Design, permitting and construction were all completed within 110 days.	
Burt Reynolds Boat Ramps Palm Beach, FL Palm Beach County Parks & Recreation Dept. Ms. Karen Arndt (561) 233-0208	C3TS was selected to provide the design and permitting for this 300 foot dock extension at the west side boat ramp complex in Jupiter, Florida. Originally, the complex involved a much larger dock system, but was reduced in scope due to ownership issues with submerged lands and sovereign waters of the State of Florida. C3TS applied for and received permits from South Florida Water Management District, Florida Department of Environmental Protection and the Army Corps of Engineers but with restrictions on dock width and height in accordance with the ACOE design guidelines. An exception was applied for and received for a variation to the design allowing it to match that of the existing docks. Permitting also included site plan approval from the Town of Jupiter as well as engineering permits for the structural design. Dock constriction involved wood piers and framing with fibergrate decking for seagrass mitigation.	
Houseboat Row Seagrass Restoration Project Key West, FL FDOT, District 6	The Houseboat Row site is a historic seagrass flat that was dredged for the mooring of houseboats. C3TS will restore the dredged are by backfilling the area to reestablish the historic elevation for successful seagrass colonization. The proposed project has been authorized and permitted by the U.S. Army Corps of Engineers (USACE) and the South Florida Water Management District (SFWMD) as mitigation for impacts associated with the reconstruction and roadway improvements of North	

for impacts associated with the reconstruction and roadway improvements of North

Roosevelt Boulevard (SR 5/US 1).

# REPRESENTATIVE DESIGN PROJECTS & CLIENT REFERENCES

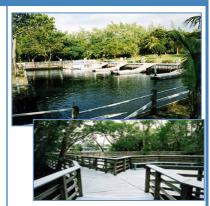
C3TS

#### PROJECT NAME DESCRIPTION PROJECT IMAGES

Deerfield Island Park Boardwalk Park Deerfield Beach, FL

Recreational Design & Construction, Inc. Mr. Joseph Cerrone (954) 566-3885 Deerfield Island Park is a designated urban wilderness area and is located on the Intracoastal Waterway near the Broward/Palm Beach County line. The heavily wooded 56-acre site was originally constructed under the old County work program and is leased from the state.

Phase I of the rebuilding effort included upgrading the structural integrity of the aging boardwalk system and installing recycled plastic docking material. Since the park is only accessible by boat or the County's ferry service, all construction materials had to be brought in on barges. Even under these unusual circumstances, RDC brought the project in on time and on budget. Phase II included marina upgrades, ADA-accessible docks, and additional recycled plastic boardwalks to all the park amenities, restrooms, picnic areas and educational kiosk.



West Mashta Drive Bridge Key Biscayne, FL

Village of Key Biscayne Mr. Armando Nuñez (305) 365-8945 The Village of Key Biscayne hired C3TS to build a bridge in order to produce a tidal flushing action between two dead-end water bodies, with the aim of providing storm surge protection and regular tidal cleansing. Our design utilized pre-cast concrete arched units to span the channel, and was guided by the principle that a concern for aesthetics does not compromise engineering technical quality, but rather serves to improve it. The construction was phased to allow two-way traffic throughout construction. With its new amenities, the bridge has become a focal point for the entire community. Built into the bridge are wide sidewalks and overlooks, allowing pedestrians and cyclists to stop and enjoy the views of Biscayne Bay.



SR 10A Bridge Replacement over Bayou Texar Pensacola, FL FDOT District 3 Mr. Brian Blanchard, PE (FDOT Central Office) (850) 414-5240 The Florida Department of Transportation District 3 selected C3TS for the design of the Bayou Texar/SR 10A bridge replacement, near Pensacola, Florida. The project includes the preparation of full roadway and bridge plans for the replacement of the 155.8 meter (511 linear foot) four-lane bridge over coastal waters, as well as the reconstruction of 509.1 meters (1670 linear feet) of approach roadway. The bridge was built using phased construction, maintaining four lanes of traffic operational during construction. This was accomplished through the use of a two-lane Acrow bridge with sheet pile abutments into the Bayou. Architectural enhancement features, bridge and roadway lighting are also included.



Jewfish Creek Design-Build Bridge Key Largo, FL

FDOT District 6 Mr. Jose Barrera, PE (305)470-5260 The firm of C3TS was part of the original design team that developed final construction plans for a new high-level bridge to replace the existing bascule bridge over Jewfish Creek along SR 5 / US 1 in the Upper Florida Keys. The original concept included a 4-lane facility with two access interchanges on either side of Jewfish Creek to access the Gilbert's Marina and the Anchorage Resort. The interchange structure for the Anchorage Resort consisted of a series of bridge ramps connecting to the mainline bridge; while the access interchange to the marina consisted of the use of geogrid stabilized embankment over approximately eleven feet of muck. As part of the original design, C3TS was also responsible for the development of the maintenance of traffic and stormwater pollution prevention plans for the 2-mile corridor. When this original project was stopped by environmental and public concerns the Florida Department of Transportation modified the original project to a 2-lane facility and advertised the project to utilize the Design-Build project delivery system. C3TS, as part of the Design-Build Team, competed and won the Design-Build contract worth approximately \$140 million. As an innovative concept the Design-Build Team developed a new bridge ramp configuration for the access to the Anchorage Resort consisting of the use of four diamond type slip ramps and a roundabout for the five leg intersection below the mainline. The renderings depicted here represent the bridge ramps and bulkhead wall design concepts designed by C3TS as part of the Design-Build Team.





#### SLIB-CONSULTANTS

PROJECT NAME	DESCRIPTION	PROJECT IMAGES
Marlin Pier, Garrison Bight Marina Key West, FL Gunderboom, Inc. Ms. Chelsea Cash (407) 221-0269 RWS Experience	Reece & White Land Surveying, Inc. conducted the following: -Elevation of bulkhead in relation to mean high and mean low water -Bathymetry in area of proposed pile locations along existing dock -Top of existing pile elevations -Set baseline for construction -Stake-out for new pile alignment	
Marlin Pier, Garrison Bight Marina Key West, FL City of Key West Mr. Doug Bradshaw (305) 797-8361 TME Experience	TerraMar Environmental Services, Inc. conducted the following: -Prepare ERP permit application including benthic resource assessment and supporting information to obtain FDEP and USACE permits for the replacement of the Marlin Pier in Garrison Bight (sub consultant to Gunderboom)	
Mallory Pier Rehabilitation, Key West, FL City of Key West Mr. Doug Bradshaw (305) 797-8361 TME Experience	TerraMar Environmental Services, Inc. conducted the following: -Conducted benthic resource assessment for the Mallory Square Pier for the City of Key West (sub consultant to Gunderboom)	
Pier House Resort & Spa Key West, FL  The Richard E. Jacobs Group, Inc Mr. Michael R. Johnson (440) 871-4800 PSI Experience	The project consisted of the construction of a Pier House facility at 1 Duvall Street in Key West, Florida. PSI conducted a geotechnical engineering study during which time the existing facility was being demolished to accommodate the new development. Several one-story concrete block structures (CBS), mostly used as restaurants were noted to be present on the property. Due to accessibility constraints posed by the existing structures, a barge/crane unit was used in transporting (via water) the drilling equipment to the project location. PSI executed a program of field exploration consisting of subsurface sampling and field testing at the site. Samples were visually classified in our laboratory and analyses were performed to determine the estimated allowable capacity and settlements for a deep foundation system. During construction, PSI provided Construction Materials Testing and Inspection services consisting of field and laboratory testing of soils and materials, auger cast pile installation monitoring, sheet pile installation inspection for new seawalls, reinforcing steel and masonry inspections.	
S197 Structure Replacement U.S. 1 in Proximity to Manatee Bay Miami-Dade County, FL  South Florida Water Management District (SFWMD) Mr. N. Davies Mtundu, Ph.D., P.E., PMP (561) 242-5520 PSI Experience	The project site is located near the mouth of Canal C-111 and is less than 1,000 feet east of U.S. 1 and approximately 3 miles from the shore of Manatee Bay in the Southeastern part of Miami-Dade County, Florida (Homestead Field Station service area). The SFWMD is planning to replace the existing S-197 water control structure from corrugated metal pipe (CMP) culverts to reinforced concrete box structures. The S-197 structure maintains optimum upstream water level in Canal C-111 and prevents saline intrusion during high tides. Most of the time, S-197 diverts discharge from the S-18C overland to the panhandle of the Everglades National Park and releases water during major floods as established by the structure's operational plan. Performance of our field work included a fulltime manatee observation and turbidity monitoring. In land, our geotechnical field investigation revealed surficial fill material comprising limerock, fine sand and silt. In water, a soft compressible silt stratum was disclosed. Keeping in mind, the potential settlement to be induced by the proposed structure, we provided cost-effective foundation alternatives. We also provided	

recommendations for a cofferdam and tremie seal to facilitate construction.





# REFERENCES





# REFERENCES

## **REFERENCES**



Reference #1:

Client: Palm Beach County Parks & Recreation Dept.

Address: 301 N. Olive Avenue

West Palm Beach, FL 33401

Contact: Ms. Karen Arndt Phone: (561) 233-0208 Project: Waterway Park



Client: Ocean Reef Club

Address: 35 Ocean Reef Dr # 146

Key Largo, FL 33037-5259

Contact: Mr. George Richards

Phone: (305) 367-5919

Project: Marine Max Facility at Ocean Reef Club

Reference #3:

Client: St. Lucie County Address: 2300 Virginia Avenue

Fort Pierce, Florida 34982

Contact: Mr. Don McLam Phone: (772) 462-1514

Project: Fort Pierce Inlet Marina Boat Ramp Facilities











# **FORMS**

#### ANTI-KICKBACK AFFIDAVIT

SS:
COUNTY OF MONROE
I, the undersigned, hereby duly sworn, depose and say that no portion of the sum herein response will be paid to any employee of the City of Key West as a commission, kickback, reward or gift, directly or indirectly, by me or any member of my firm, or by any officer of the corporation.
BY: Timarce M. Allmt
Sworn and prescribed before me this17 <sup>th</sup> day ofMay, 2011
NOTARY PUBLIC, State of Florida

My commission expires:

STATE OF FLORIDA

# SWORN STATEMENT UNDER SECTION 287.133(3)(a) FLORIDA STATUTES, ON PUBLIC ENTITY CRIMES

THIS FORM MUST BE SIGNED IN THE PRESENCE OF A NOTARY PUBLIC OR OTHER OFFICE AUTHORIZED TO ADMINISTER OATHS.

1.	This sworn statement is submitted with Bid, Bid or Contract No	RFQ #11-002 for
	City of Key West - Design of Tarpon Pier for City Marina at Gar	rison Bight
2.	This sworn statement is submitted by Corzo Castella Carbal (Name of ent	lo Thompson Salman, P.A. (C3TS) ity submitting sworn statement)
	whose business address is 901 Ponce de Leon Boulevard, Suite	900, Coral Gables, Florida 33134
	Employer Identification Number (FEIN) is65-00394 include the Social Security Number of the individual signing this s	When the second
	include the Social Security Number of the individual signing this s	worn statement.)
3.	My name is Terrance N. Glunt, PE and (Please print name of individual signing)	my relationship t
	the entity named above is Vice President	
4.	I understand that a "public entity crime" as defined in Paragraph 28 of any state or federal law by a person with respect to and directly public entity or with an agency or political subdivision of any other not limited to, any Bid or contract for goods or services to be political subdivision of any other state or of the United States collusion, racketeering, conspiracy, material misrepresentation.	related to the transaction of business with an er state or with the United States, including, bu provided to any public entity or an agency of
5.	I understand that "convicted" or "conviction" as defined in Para finding of guilt or a conviction of a public entity crime, with or w state trial court of record relating to charges br July 1, 1989, as a result of a jury verdict, nonjury trial, or entry of a	ithout an adjudication of guilt, in any federal cought by indictment information after
6.	I understand that an "affiliate" as defined in Paragraph 287.133(1)(	a), Florida Statutes, means:
	A predecessor or successor of a person convicted of a pub.	lic entity crime: or
	<ol> <li>An entity under the control of any natural person who is has been convicted of a public entity crime. The terr executives, partners, shareholders, employees, members a an affiliate. The ownership by one person of shares const</li> </ol>	n "affiliate" includes those officers, director and agents who are active in the management of

 I understand that a "person" as defined in Paragraph 287.133(1)(8), Florida Statutes, means any natural person or entity organized under the laws of any state or of the United States with the legal power to enter into a binding

the preceding 36 months shall be considered an affiliate.

a pooling of equipment or income among persons when not for fair market value under an arm's length agreement, shall be a prima facie case that one person controls another person. A person who knowingly enters into a joint venture with a person who has been convicted of a public entity crime in Florida during

contract and which Bids or applies to Bid on contracts for the provision of goods or services let by a public entity, or which otherwise transacts or applies to transact business with a public entity. The term "person" includes those officers, directors, executives, partners, shareholders, employees, members, and agents who are active in management of an entity.

Based on information and belief, the statement which I have marked below is true in relation to the entity

8.

submitting this sworn statement. (Please indicate which statement applies.)
X Neither the entity submitting this sworn statement, nor any officers, directors, executives, partners, shareholders, employees, members, or agents who are active in management of the entity, nor any affiliate of the entity have been charged with and convicted of a public entity crime subsequent to July 1, 1989.
The entity submitting this sworn statement, or one or more of its officers, directors, executives, partners, shareholders, employees, members, or agents who are active in the management of the entity, or an affiliate of the entity has been charged with and convicted of a public entity crime subsequent to July 1, 1989, AND (Please indicate which additional statement applies.)
There has been a proceeding concerning the conviction before a hearing of the State of Florida, Division of Administrative Hearings. The final order entered by the hearing officer did not place the person or affiliate on the convicted vendor list. (Please attach a copy of the final order.)
The person or affiliate was placed on the convicted vendor list. Them has been a subsequent proceeding before a hearing officer of the State of Florida, Division of Administrative Hearings. The final order entered by the hearing officer determined that it was in the public interest to remove the person or affiliate from the convinced vendor list. (Please attach a copy of the final order.)
The person or affiliate has not been put on the convicted vendor list. (Please describe any action taken by or pending with the Department of General Services.)  (SIGNATURE)
May 17, 2011
(DATE)
STATE OF FLORIDA
COUNTY OF MONROE
PERSONALLY APPEARED BEFORE ME, the undersigned authority,
Terrance Glunt who, after first being sworn by me, affixed his/her signature in the (Name of individual signing)
space provided above on this17 <sup>th</sup> day of, 2011.
My commission expires:
Notary Public State of Florida Grace Morales My Commission DD723249 Expires 11/16/2011



#### THE CITY OF KEY WEST

525 Angela Street Key West, FL 33040

#### **ADDENDUM 1:**

Design of Tarpon Pier Replacement for City Marina at Garrison Bight Request for Qualification RFQ#11-002 April 29, 2011

This addendum is issued as supplemental information to the bid package for clarification of certain matters of both a general and a technical nature. The referenced bid package is hereby addended in accordance with the following items:

- 1. Attached is the prebid sign in sheet (1 attachment)
- 2. Attached to this email is an electronic copy of the document City Marina Inspection developed by CH2MHILL (1 attachment)
- 3. Attached is an electronic copy of the Marina Management Plan (1 attachment)
- 4. Attached is a copy of the Permit documents required during the construction of the Marlin Pier Replacement Project (3 attachments)
- 5. Response to Questions; The following are responses to questions received.
  - Are the cover letter, covers, and section dividers included in the limit of 25 pages for responses? Response: The information page, organization chart, methodology and approach, company information, personnel, qualifications and references shall be no more than 25 written pages.
  - My copy of the RFQ only includes 2 pages for the Public Entity Crimes form (pages 10 and 11), however page 1 indicates that this form is 3 pages. Please clarify. Response: The Public Entity Crimes Form is 2 pages in length..

All Proposers shall acknowledge receipt and acceptance of this Addendum No. 1 by submitting the addendum with their proposal. Proposals submitted without acknowledgement or without this Addendum may be considered non-responsive.

Signature

Name of Business



**Architectural Design** Civil Engineering Coastal Engineering Construction Administration **Electrical Engineering Environmental Sciences** Grants Administration **Highway Engineering** Interior Design **Mechanical Planning Public Involvement** Site Development Structural Engineering

